ION TOYMIYOH, AHMOO IBN 'ABD SL-HZUM

## Ibn Taymiyya Against the Greek Logicians

TRANSLATED WITH AN INTRODUCTION AND NOTES BY

WAEL B. HALLAQ

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For Ghada, Lena, and Cherine



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## INTRODUCTION

I. Ibn Taymiyya's Opponents and his Refutation of the Logicians

I

In 709/1309, Taqī al-Dīn Ibn Taymiyya spent eight months in a Mamlūk prison in Alexandria. There he apparently received some visitors whose identity we do not know but who had strong leanings towards philosophy. Though his interest up till that time lay in confuting the metaphysical doctrines of the philosophers, he there made up his mind to write a refutation of logic, which he thought to be the ultimate source of the erroneous metaphysical doctrines espoused by the philosophers. His critique culminated in a substantial tome, al-Radd alā al-Mantiqiyyīn, one of the most devastating attacks ever levelled against the logic upheld by the early Greeks, the later commentators, and their Muslim followers.

The richly documented biographical and bio-bibliographical accounts of Ibn Taymiyya by contemporary and later biographers and historians enable us to understand both his declared and latent

<sup>2</sup> Ibn Taymiyya, al-Radd, 3; idem, Jahd, 82 (Translation, par. 3, below). On the numerous visitors he received in the Alexandrian prison, see Shawkānī, al-Badr al-Tāli', i. 69.

<sup>&</sup>lt;sup>1</sup> Karmī, al-Kawākib al-Durriyya, 180-1. Tagı al-Dīn Abū al-'Abbās Ahmad b. Abd al-Halim b. al-'Imād b. Muhammad Ibn Taymiyya al-Hanbalī was born at Harrān in Syria in 661/1263, and from 667/1269 lived in Damascus, having fled Harran as a consequence of the Mongol invasion. Most of his life was spent in Damascus and Cairo, the chief cities of the Mamlük state. He spent a total of over six years of his life in prison as the result of his campaign against contemporary ulama, particularly the Sūfīs and their prominent spiritual leaders. Ibn Taymiyya's career was documented in relative detail. Some of the important primary works giving biographical accounts of Ibn Taymiyya are: Ibn Kathīr, al-Bidāya wal-Nihāya, xiv. 134-40; Kutubī, Fawāt al-Wafayāt, i. 44-58; Karmı, al-Kawākib al-Durriyya, 138-231; Bukhārī, al-Qawl al-Jalī, 100-35; Ibn al-Imad, Shadharat al-Dhahab, vi. 80-6; Dhahabi, Tadhkirat al-Huffaz, iv. 1496-8; Ālūsi, Jalā' al-'Aynayn, 57 ff. and passim; Shawkānī, al-Badr al-Tāli', i. 63-72. Secondary sources include the following: Brockelmann, Geschichte, suppl. ii. 119-26; Laoust, 'La Biographie', 115-62; idem, Essai, 634-40, for a list of biographical references; idem, 'L'Influence', 15 ff.; idem, 'Le Reformisme', 27-47; Little, 'Detention of Ibn Taymiyya', 312ff.; Haque, 'Ibn Taymiyya', 796-819; Encyclopaedia of Islam2, iii. 951-5, s.v. 'Ibn Taymiyya' (by H. Laoust); Abū Zahra, Ibn Taymiyya. For a psychological profile see Little, 'Did Ibn Taymiyya Have a Screw Loose?', 93-111.

<sup>&</sup>lt;sup>3</sup> See his al-Radd, 3, and Jahd, 82 (Translation, par. 3, below).

motives in writing against the logicians. It is not difficult to see the reasons behind his biting attacks against that logic which he deemed the sole agent leading to the philosophical doctrines of the eternity of the world, the nature and attributes of God, the hierarchy and mediatory role of the Intelligences, prophethood, the creation of the Quran, etc. All these teachings, as espoused by the philosophers, stood in stark contrast to what he perceived to be the Sunnī Weltanschauung that was dictated by the letter of the Quran and the Sunna of the Prophet. But markedly less obvious in his attacks on logic are undercurrents of resentment against what he viewed in a good number of other treatises as the most dangerous of all threats which lay in the heart of Islam,4 namely, speculative mysticism propounded by such influential figures as Ibn Sab'īn (d. 669/1270), Qūnawī (d. 673/1274), Tilimsānī (d. 690/1291), and above all Ibn 'Arabī (d. 638/1240). We must emphasize, however, that it was only pantheistic mysticism which he opposed, for he himself was a member of the traditional, non-Ittihādī Sūfī orders, particularly that of 'Abd al-Qādir al-Jīlī.5

Ibn Taymiyya could hardly avoid criticizing the logical foundations of speculative mysticism since he categorically rejected the doctrine of the Unity of Existence (wahdat al-wujūd), its logical underpinnings, and its relationship to Platonic philosophy. His continuous struggle against the Ittihādī Sūfīs had begun much earlier and earned him a number of stays in Mamlūk prisons from 705/1305 onwards. 6 In fact, his aforementioned imprisonment in Alexandria four years later was the unhappy result of a demonstration by more than five hundred apparently Ittihādī Sūfīs who complained to the Sultan about Ibn Taymiyya's belligerent preachings against their spiritual leaders. 7 In an attempt to appreciate the full force of his critique, one can hardly overstress the importance of what he perceived to be the cancerous threat of Ittihādī Sūfism, which he thought to be more calamitous than the invasion of the Mongols. 8

Even if we were to reduce the objects of Ibn Taymiyya's attacks to the writings of Ibn Sīnā and Ibn 'Arabī, and set aside his scathing

Shaykh al-Manbijī.

<sup>&</sup>lt;sup>4</sup> See n. 8 below.

See Makdisi, 'The Hanbali School and Sufism', 115-26, esp. 121 ff.
 Karmī, al-Kawākib al-Durriyya, 177 ff.; Laoust, Essai, 125 ff., 132 ff.

Karmī, al-Kawākib al-Durriyya, 180; Little, 'Detention of Ibn Taymiyya', 312.
 Tawhīd al-Rubūbiyya, 132, and Alūsī, Jalā' al-'Aynayn, 88, for his letter to al-

and massive criticism of countless other philosophical, mystical, theological, and sectarian doctrines, we would still come to the realization that what Ibn Taymiyya was fighting against amounted to everything that directly or indirectly derived from what was termed 'the ancient sciences' (ulūm al-awā'il). Ibn Sīnā's cosmology had for its foundation Aristotelian-Ptolemaic doctrines with a Neoplatonic structure in which the emanationist philosophy of being was thoroughly incorporated. His logic was manifestly Aristotelian but not without Stoic and Neoplatonic influences. Likewise, Ibn 'Arabī made use of the Platonic Ideas, and his cosmology integrated not only the pseudo-Empedoclean doctrines of Ibn Masarra (d. 319/931) but above all Alexandrian elements as found in the doctrines of Ikhwan al-Safa'. Admittedly, the latter were indebted to the teachings of Pythagoras and Nichomachus, particularly in their treatment of the metaphysics of number. They were no less indebted to Jābir b. Hayvān (d. 160/776), who was in turn influenced by Plato, Pythagoras, and Apollonius as well as by Indian and Hermetic sources. 10

More significantly, however, later Sūfism, particularly that of Ibn 'Arabī, shows affinity with the philosophy of Ibn Sīnā, 11 especially with regard to wahdat al-wujūd, the doctrine that generated the fiercest attacks by Ibn Taymiyya. Ibn Sīnā's cosmogony stresses the relation of contingent beings to the Necessary, Absolute Being, and the effusion of the former from the latter. While the effused universe is distinguished from this Being, the generated universe none the less maintains a unitary relationship with the source of its own existence. Thus it is argued that, although the rays of the sun are not the sun itself, they are not other than the sun. 12 Ibn 'Arabī, like many speculative Sūfīs, upheld this doctrine and argued the impossibility of two independent orders of reality. And in anticipation of Ibn 'Arabī, Ibn Sinā, departing from this unitary emanative scheme, seems to have held that the gnostic is capable of attaining a complete union with God. 13 We shall later return to the crucial ramifications of such mystical and philosophic positions, at least as Ibn Taymiyya

<sup>&</sup>lt;sup>9</sup> See e.g. his *Jahd*, 176 (Translation, par. 167, below), where he speaks of the influence the philosophers had over the Sūfīs and others. See also *al-Radd*, 186-7.

<sup>10</sup> See Nasr, *Cosmological Doctrines*, 37-8.

<sup>&</sup>lt;sup>11</sup> Cf. Morewedge, 'Emanationism and Sūfism', 17; Anawati, 'Philosophy, Theology, and Mysticism', 374-8.

<sup>&</sup>lt;sup>12</sup> Nasr, Cosmological Doctrines, 202-3.

<sup>13</sup> Houben, 'Avicenna and Mysticism', 216 ff., esp. 219; Morewedge, 'Emanationism and Sūfism', 13-14.

perceived them, but for the moment shall merely assert that for all these teachings, however philosophically variegated they may be, Ibn Taymiyya held the logic of Aristotle and of those who followed him to be the ultimate culprit. His grievance against logic was not simply that it existed, but rather that it existed in and infested the core of the Islamic religious sciences. He certainly had serious doubts about logic as the organon of philosophy and metaphysics, but when logic penetrated the pale of Sunnī theology and produced such philosophical theologians as Fakhr al-Dīn al-Rāzī (d. 606/1209), Āmidi (d. 632/1234), and Urmawī (d. 682/1283), Ibn Taymiyya clearly felt an alarming threat that should be rebuffed. His, then, was the critique of a logic that brought under its wings not only Plato, Aristotle, the Stoics, Ibn Sīnā, and the rest of the Arabic philosophers, <sup>14</sup> but also, and I think primarily, the pantheistic Ṣūfīs, the Shi'is and the speculative theologians (ahl al-kalām). <sup>15</sup>

2

The reader of Ibn Taymiyya's works cannot but be struck by his extraordinary ability to define and isolate the crucial and fundamental principles upon which the most complex systems of thought are erected. He was never distracted by the multiplicity and variety of uses to which logic was put in Islamic religious discourse. Nor did he attempt, as more recent critics have done, <sup>16</sup> to refute or argue against the many secondary, and sometimes marginal, suppositions and postulates of logical doctrines. Instead, he took up a few, but most central and fundamental, logical principles and by undermining them attempted to demolish the entire edifice of logic and, consequently, that of metaphysics as well. Ultimately, his concern rested with the theories of definition (hadd) and the categorical syllogism, for which he adopted the rarely used Arabic form qiyās al-shumūl. <sup>17</sup>

It is not difficult to understand why Ibn Taymiyya should have chosen to attack the entire system of logic through the theories of

<sup>&</sup>lt;sup>14</sup> 'Arabic' and not 'Arab' philosophers (or logicians) is used advisedly here to characterize all logicians who wrote in the Arabic language irrespective of their ethnic origin. On this matter, we go along with Rescher's views expressed in his article 'The Impact of Arabic Philosophy', 147–8.

<sup>15</sup> Cf. the opinion of Laoust, 'Le Reformisme', 32 ff.

<sup>16</sup> e.g. Kāshif al-Ghitā', Naqd al-Ārā' al-Mantiqiyya wa-Hall Mushkilātihā.

<sup>&</sup>lt;sup>17</sup> In fact, he may have coined the term. To the best of my knowledge, none of the logical works employs this expression.

definition and syllogistics. Since the beginning of the fourth/tenth century, Arabic logicians had held that the acquisition of knowledge, as well as the principles governing the correct uses of the methods and processes by means of which knowledge is acquired, are the tasks of logic. 18 As there must be some postulates presupposing the acquisition of new knowledge, logic was seen as the sole tool through which sound human knowledge can be derived and augmented. On this view, then, logic stood not merely as a set of tautologies, but equally served as an epistemic system, a theory of knowledge proper. In this theory, it was emphasized that, to avoid an infinite regress, the mind must be seen as proceeding from some a priori or pre-existent axiomatic knowledge to new concepts (tasawwurāt) by means of definitions. If we know, for instance, what 'rationality' and 'animality' are, we can form a concept in our minds of 'man', who is defined as 'a rational animal'. It is through definitions, then, that concepts are formed. 19

Once such concepts are acquired, the mind can proceed to a more active level of knowledge by predicating one concept of another. If we have formed the concepts of 'man' and 'intelligent', we can formulate the judgement (taṣdīq), true or false, that 'man is intelligent'.<sup>20</sup> A still more developed stage of knowledge may be reached by constructing or ordering (ta'līf) judgements in such a manner that we may obtain an inference—be it syllogistic, inductive, analogical, or some other form of argument.<sup>21</sup> However, following in the footsteps of Aristotle,<sup>22</sup> Arabic logicians deemed the syllogism as the only argument capable of yielding apodictic knowledge, and thus they considered it the chief, indeed the only, tool which can bring about taṣdīq with certitude.<sup>23</sup>

In order to achieve a complete definition (hadd tāmm), which is the ultimate pursuit of the logician, there must be taken into account the species (anwa'), the genera (ajnās), and the differences

<sup>&</sup>lt;sup>18</sup> Ibn Sınā, Shifā': Madkhal, 17; Rāzī, Tahrīr, 24, and see Translation, par. 3, n. 4, below.

<sup>19</sup> Lawkarī, Bayān al-Haqq, i. 123-4; Rāzī, Taḥrīr, 7-13; Ghazālı, Maqāsid, 33-4.
20 On tasawwur and tasdīq, see Wolfson, 'The Terms Tasawwur and Tasdīq', 114-19; Sabra, 'Avicenna', 757-61.

<sup>&</sup>lt;sup>21</sup> See Ibn Sınā, Najāt, 43-4; idem, Shifā': Madkhal, 16ff.; Ghazālī, Maqāṣid, 35-6.

<sup>22</sup> Bochenski, Ancient Formal Logic, 25.

 <sup>23</sup> See e.g. Ibn Sinā, Najāt, 43-4, in conjunction with 69, 97; Yahyā b. 'Adī, Tabyīn, 184, 183 (nos. 21, 22); Rāzī, Tahrīr, 24-5.
 24 Chazāl, Mazād and Adama Ada

<sup>&</sup>lt;sup>24</sup> Ghazāh, Maqāṣid, 34, acknowledges the essential hadd (definition) as the sole means to form a concept.

(fuṣūl) partaking in the composition of the definiendum. Failing that, a property (khāṣṣa) or a general accident ('araḍ amm) may be employed in delimiting the definiendum, though such a delimitation would not be a definition proper but merely a description (rasm). Instead of the definition of man as 'a rational animal', a description would be 'a laughing animal', 'laughing' being an accidental attribute. In either case, however, it is through Porphyry's five predicables that a definition or a description may be obtained.

Complete or real definition, the highest objective of the definer, requires a statement of the definiendum's quiddity, represented in the essential attributes constituting the genus and the difference to the exclusion of the property and the general accident. But in making a statement of the quiddity, only the essence as essence must be understood to be constitutive (muqawwim) of the quiddity. The essence is that without which a thing having this essence can never be an object of our apprehension. Nor does a thing, to be characterized, require a cause other than its own essence. Blackness is in itself a colour, not due to another factor rendering it a colour; that which caused it to be blackness caused it first to be a colour. More important, the essence cannot, by definition, be removed from a thing of which it is an essence without removing that thing from both mental and extramental existence: the essence as essence is both identical with, and the cause of, quiddity. 26

An essence in itself has no necessary connection with existence, for existence is *superadded to*, and is *not constitutive of*, quiddity. But existence may attach to the essence either in the mind or in the external world. Genus and difference constitute the means (*sabab*) that bring about the mental existence of the essence, while form and matter make up the cause of the external existence when individuation is realized.<sup>27</sup> Hence, essence considered as essence exists neither in the mind nor in the external world.<sup>28</sup>

When quiddity attaches to existence, it also becomes attached to attributes that are accidental to it, but which are either separable (mufāriq) or inseparable from it (ghayr mufāriq). The latter are necessary to (lāzim), and constantly conjoined with, quiddity,

<sup>27</sup> Ibid. i. 202-3; Ibn Sınā, Najāt, 239 ff.

<sup>25</sup> Tūsī, Sharh al-Ishārāt, i. 200.

<sup>26</sup> Ibid.

<sup>&</sup>lt;sup>28</sup> Ibn Sīnā, Shifā': Madkhal, 15; Tūsī, Sharh al-Ishārāt, i. 202-3; Marmura, 'Avicenna's Chapter on Universals', 35, 36; cf. Rahman, 'Essence and Existence', 3 ff.

although they are neither constitutive nor a part of quiddity. In contrast with 'figure', which is the quiddity of a triangle, the attribute necessary to, but separable from, such a quiddity is the triangle's having angles equal to two right angles.<sup>29</sup> The triangle's angles amounting to two right angles represents a necessary quality of triangles but cannot be possible prior to the formation of the *figure* making up the quiddity of a triangle. A necessary, inseparable attribute must thus presuppose a quiddity; and it is in this sense that such an attribute is not constitutive.<sup>30</sup>

In contrast to the necessary and inseparable attribute, the separable attribute, by definition, neither attaches to, nor is necessarily concomitant with, quiddity. The accidental nature of such a predicable allows it to be attached to, or separated from, a subject according to degrees. Youth, for instance, is a separable attribute that detaches itself from man at a pace slower than does the position of sitting down or standing up.<sup>31</sup>

Now, this philosophical doctrine of essence and accident was propagated by Ibn Sīnā, whose writings on the issue represent the culmination of a process that began at least as early as Aristotle, but still served, in its Avicennian form, as the basis of later philosophical discourse. The doctrine puts forth two postulates that emerge as salient features of the basic distinction between essence and accident. These postulates require a distinction to be drawn between quiddity and its existence, and also between essential and necessary, inseparable attributes. It is precisely these two distinctions, together with the more general but fundamental distinction between essence and accident, that formed the chief target of Ibn Taymiyya's criticism of the larger issue of real, complete definition.

Against the foregoing distinction between essence and accident, Ibn Taymiyya forcefully argues that there is nothing intrinsically inherent and objective in such a distinction. That one attribute is considered essential while another accidental is no more than a convention (wad') according to which matters in the natural world are viewed in a certain manner: and convention is nothing but the result of what a group of people invents (takhtari') and agrees to use or accepts as a norm. Just as a person can speak of man as a rational animal, another can speak of man as a laughing animal. A person

<sup>29</sup> Ibn Sīnā, Ishārāt, i. 199, 205-7; Tūsī, Sharh al-Ishārāt, i. 201, 206-7.

Tüsī, Sharh al-Ishārāt, i. 206-7.
 Ibn Sīnā, Ishārāt, i. 213.

may, in agreement with Greek and Arabic logicians, deem colour an essential attribute of redness and still refuse to take animality to be an essential attribute of man.<sup>32</sup> For Ibn Taymiyya, the attributes of a thing are those attached to it in extramental existence, nothing more or less, and they are all of the same kind.<sup>33</sup> Attempts at designating a particular quality as essential while another as accidental are entirely arbitrary. Besides, such a distinction presumably allows one to conceive an essence abstracted from its necessary attributes, or more concretely, it makes it possible to conceive a crow without including in our apprehension that it is black.<sup>34</sup> The distinction between essential and accidental attributes is simply not found in the objective world of things.<sup>35</sup>

Such a distinction is thus man's own creation and is relative to the particular individual and his own perception of things in the world. More specifically, the distinction is determined by one's own intention (maqsad) as well as the language (lafz) that one uses to classify and categorize these things.<sup>36</sup> Here, Ibn Taymiyya clearly anticipates the more recent criticism voiced, among others, by Locke. According to this criticism,<sup>37</sup> attributes are neither essential nor accidental in themselves, but can be so categorized according to our particular view of, and subjective interest in, them. We define tables, for instance, mainly on the basis of our interest in them and the function they have in our lives, without any regard to their colours. If we change the colour of a table from black to green, the change will be considered accidental and thus will not effect a change in our real definition of it. But if our interest in tables lies in their colour, then the same objective reality would be categorized rather differently, and this difference is strictly a function of the language and words that we use to label things existing in the objective world. Imagine a language that does not have the universal term 'table' but instead employs the term 'teeble' for green tables, and 'towble' for brown tables, etc., since the interest of this language and those who speak it lies in the colours of tables. Thus if a teeble is painted brown, it will

<sup>32</sup> Ibn Taymiyya, al-Radd, 68 (ll. 18-21).

<sup>33</sup> Ibid. 68-9.

<sup>&</sup>lt;sup>34</sup> Ibid. 69.

<sup>35</sup> Ibid. 68, 70, 402, and passim.

<sup>36</sup> Ibid. 68 (II. 22-3): 'wa-hādhā amr yatba' qaşd al-mutakallim wa-ghāyatah wa-mā dalla 'alayhi bi-lafzihi, lā yatba' al-haqā'iq al-mawjūda fı nafsihā.'

<sup>&</sup>lt;sup>37</sup> An interesting analysis of this criticism may be found in Copi, 'Essence and Accident', 153 ff.

be essentially changed into a towble.<sup>38</sup> A less hypothetical example is afforded by the Arabic language. The fruits growing on palm trees and commonly known in the English language as dates, regardless of whether they are ripe or not, are called in Arabic by several specialized terms, each coined to characterize a particular stage of maturity. Accordingly, busr (unripe dates) will cease to be busr once they become somewhat ripe, when they will acquire the name rutab. A more advanced stage of maturity will render them tamr. In this case, the real essence changes in accordance with the alteration of the quality of ripeness, a quality not reflected in the English usage. What is essential in Arabic is not necessarily so in English.

The conventions of language also involve another use of nominal essences relative to the special circumstances of individuals using words or referring to things. Real essences require the use of a language that precisely describes, and corresponds to, the quiddity of a thing. Ibn Taymiyya avers that this is not always possible since a person may think of an essence in terms that are wider but inclusive (tadammun) of the essence, or through words that imply or explicitly entail (iltizām) that essence.<sup>39</sup> Again, the cases of the Arabic and English linguistic conventions seem adequate to illustrate Ibn Taymiyya's point. The use of the word 'dates' in the English language is inclusive of the essential attributes found in the Arabic busr. In this case, the word 'dates' and its real definition remain wider than the objective, external reality of busr. Likewise, within one and the same language, the term 'laughing' may be used to indicate 'man' by entailment, since man is the only 'laughing' being.<sup>40</sup>

Thus, the distinction, in Ibn Taymiyya's view, between essential and accidental, necessary attributes is as arbitrary as it is conventional and subjective. Against the argument that the quiddity must occur in the mind prior to the accidental attributes, he insists that a person may conceive the blackness of a thing—blackness being an accidental attribute according to the logicians—without at all conceiving that what he has conceived is a colour, this latter being in their view the quiddity. So also can the mind conceive a human without conceiving that he or she is rational. It hus, just as arbitrary as the distinction

<sup>&</sup>lt;sup>38</sup> This example is borrowed from Copi, ibid. 155.

<sup>39</sup> See his al-Radd, 68.

<sup>&</sup>lt;sup>40</sup> Examples of linguistic correspondence (mutābaqa), inclusiveness (tadammun), and entailment (iltizām) may be found in Tūsī, Sharh al-Ishārāt, i. 187; Ghazālī, Maqāsid, 39; idem, Mi'yār, 72; Lawkarī, Bayān al-Haqq, i. 131-2.

<sup>41</sup> al-Radd, 70; Jahd, 99 (Translation, par. 35, below).

between essence and accident is the preferential arrangement of attributes, an arrangement which, Ibn Taymiyya forcefully argues, can exist only in the mind. In the external world there simply exists no such arrangement.<sup>42</sup>

In Ibn Taymiyya's view, the philosophers' arbitrary and, at best, conventional distinction between essence and accident is matched only by their other distinction between, on the one hand, quiddity qua quiddity, that is, essence considered simply as essence, and, on the other, the ontological status of an essence. Essence as essence, Ibn Sinā and his followers argue, exists neither in the mind nor in the external world. But when genus and difference or, alternatively, form and matter attach to it, it then comes into existence mentally or extramentally, respectively. For Ibn Taymiyya nothing can exist outside the realm of the external world and the sphere of the mind. <sup>43</sup> The essence must therefore be limited to only one of these two modes of existence. In the external world an essence is merely the very thing which exists, a particular and unique individual, while in the mind essence is what is represented (yartasim) of that individual therein. <sup>44</sup>

3

Ibn Taymiyya's conception of nominal essences stood squarely in opposition to the philosophical doctrine of real essences and its metaphysical ramifications. The realism of this doctrine was bound to lead to a theory of universals that not only involved metaphysical assumptions unacceptable to such theologians as Ibn Taymiyya, but also resulted in conclusions about God and His existence that these theologians found even more objectionable. The dispute, then, centred around a realist theory of universals that, in the opinion of Ibn Taymiyya, proved a God existing merely in the human mind, not in external reality.

We have seen that in the Avicennian tradition essence in itself has no mental or external existence, and that in order for such an essence to subsist in the two modes of existence certain qualities must be added to it. In the same vein, an essence in itself is neither universal nor particular, and in order for it to become universal,

<sup>42</sup> al-Radd, 71 (ll. 16ff.); Jahd, 99 (Translation, par. 35, below).

al-Radd, 67; Tawhīd al-Rubūbiyya, 158.
 al-Radd, 67; Tawhīd al-Rubūbiyya, 163, 166.

universality, which is an accident that exists only in the mind, must be added to it once the mind abstracts the essence from extramental particulars. This abstraction, however, is not limited to the essence of particulars; rather, the mind also abstracts what Ibn Sīnā characterized as that which is 'common to many' in external reality. Therefore, universality, while being separable from essence, does exist in the external world. The external world.

From the foregoing it follows that universals may be, according to a dominant classification, 48 natural, logical, or mental. The natural universal (kullī ṭabī'ī) is commonly defined as the nature or quiddity as it is in itself, that is, when it is neither a universal nor a particular, neither existent nor non-existent, neither one nor many, etc.; it is absolute (muṭlaq) and unconditioned by anything (lā bi-sharṭ shay'). The logical universal (kullī manṭiqī), on the other hand, is the accident of universality qua universality; it is absolute and unattached to anything (muṭlaq bi-sharṭ al-iṭlāq). Universality in so far as it is universality, being a logical construct, was generally considered to exist only in the mind without having any ontological status externally. Finally, the mental universal (al-kullī al-aqlī) represents the conjoinment in the mind of the nature in itself and universality in itself, that is, nature conditioned by universality (bi-sharṭ lā shay'). 49

Moreover, many Avicennian Neoplatonists held the view that these universals subsist in three modes of existence. The first mode is that of divine and angelic minds where they exist 'prior to multiplicity' (qabl al-kathra); thereafter, they exist 'in multiplicity' (fī al-kathra), when they are individuated in the sublunar world of generation and corruption. And last, they subsist 'after multiplicity' (ba'd al-kathra), when, having been abstracted, they exist in our minds. 50

This theory of universals constitutes the foundation upon which a crucial aspect of philosophical and mystical metaphysics rests.

<sup>&</sup>lt;sup>45</sup> Ibn Sīnā, Shifā': Madkhal, 65; Lawkarī, Bayān al-Ḥaqq, i. 181, 183; Marmura, 'Avicenna's Chapter on Universals', 34-5, 53 n. 5.

<sup>46</sup> Ibn Sīnā, Shifā': Madkhal, 66; Lawkarī, Bayān al-Haqq, i. 181.

<sup>&</sup>lt;sup>47</sup> For a detailed analysis see Marmura, 'Avicenna's Chapter on Universals', 35-6.
<sup>48</sup> For other classifications of universals see Tahānawī, Kashshāf, ii. 1258 ff., s.v.

<sup>&</sup>lt;sup>49</sup> Ibn Sīnā, Shifā': Madkhal, 65 ff.; idem, Najāt, 256-7; Lawkarī, Bayān al-Haqq, i. 181-3; Ahmadnagarī, Jāmi', iii. 192-3, s.v. māhiyya, and i. 413-14, s.v. jins; Tahānawī, Kashshāf, ii. 1261-2, s.v. kullı; Heer, 'Al-Jāmī's Treatise on Existence', 227; Marmura, 'Avicenna's Chapter on Universals', 39-42.

<sup>50</sup> Ibn Sīnā, Shifā': Madkhal, 69, 65; Lawkarī, Bayān al-Haqq, i. 181 ff.; Russell, History, 418.

Both Ibn Sīnā and Ibn 'Arabī, and their respective followers, have indentified God with absolute existence (al-wujūd al-muṭlaq). Ibn 'Arabī, Qūnawī, and their like took absolute existence to be existence in itself, unconditioned and unaffected by anything (lā bi-sharṭ shay'). Ibn Sīnā had already subscribed to a conception of absolute existence that is conditioned by a denial of affirmative attributes (bi-sharṭ nafy al-umūr al-thubūtiyya). Still others are reported to have identified such an existence with an absolute existence that is conditioned by complete absoluteness and universality (bi-sharṭ al-iṭlāq). Now, whatever sort of absolute existence was advocated by these philosophers and mystics, all of them affirmed, expectedly, that the absolute existence they postulated exists in the external world.

It is then quite clear that what is at stake in adopting a realist theory of universals is no less than an entire metaphysic. And it is through an examination of this theory, which belongs squarely to the sphere of logic, that Ibn Taymiyya attempts to show how involved logic is in metaphysics. In literally dozens of his treatises, Ibn Taymiyya untiringly asserts time and again that universals can never exist in the external world; they can exist only in the mind and nowhere else.<sup>52</sup> In the external world only individuated particulars exist, particulars that are specific, distinct, unique.<sup>53</sup> Each individual exists in the context of a reality (haqīqa) that is different from other realities. The uniqueness of such realities renders the individual what it is in so far as it is an individual (huwa bi-hā huwa).54 It is one of Ibn Taymiyya's cardinal beliefs that externally existing individuals are so distinct and different from one another that they cannot allow for the formation of an external universal under which they are subsumed. Between these individuals there can only be an aspect or aspects of similarity but they cannot be entirely identical.<sup>55</sup> From this

<sup>&</sup>lt;sup>51</sup> For these positions, see Ibn Taymiyya, Muwāfaqat Sahīh al-Manqūl, i. 173, 175, 178; Marmura's section on Ibn Sīnā's metaphysics in Encyclopaedia Iranica, iii. 73-9, esp. 75-7; Davidson, Proofs, 286-7 (and n. 31); Heer, 'Al-Jāmī's Treatise on Existence', 223 ff.

<sup>&</sup>lt;sup>52</sup> See e.g. Naqd al-Mantiq, 164, 194-6; Jahd, 118, 119, 204, 233 (Translation, pars. 63, 65, 225, 285, below); Muwāfaqat Sahīh al-Manqūl, i. 128-9, 176 ff., 180, 184, ii. 236 ff.; Furqān, 154; Tawhīd al-Rubūbiyya, 88 ff., 157 ff.; Tawhīd al-Ulūhiyya, 47.

<sup>53</sup> Muwafaqat Sahih al-Manqul, i. 128, 129.

<sup>54</sup> Naqd al-Mantiq, 164.

<sup>55</sup> See Muwafaqat Sahih al-Manqul, i. 65, 177. On p. 65 he argues for the uniqueness of individuals on the basis of the Quran. See also Naqd al-Mantiq, 196.

it necessarily follows, and Ibn Taymiyya states it explicitly, that the universality of the genus, species, and difference cannot be the essence, and that individual members classed under one of these universals are not identical in essence.<sup>56</sup>

The fact that externally existing individuals are only similar and not identical does not mean that universals cannot be formed. The mind can abstract that quality (or qualities) which is common to a group of externally existing individuals, thus creating a universal that corresponds (yutābiq) to these individuals. But Ibn Taymiyya rejected the view, espoused by the philosophers, that universals abstracted in this fashion or otherwise partake in the individuals in the external world. The uniqueness of the individual simply precludes the universal, which is common to many, from existing externally.<sup>57</sup> The universal is nothing more than a common, general meaning that the mind retains in order to signify individuals in the real, natural world. The universal and abstract mental meaning, Ibn Taymiyya seems to be saying, is identical with the verbal utterance and the written word that stand for that meaning. The written word corresponds to, and expresses, the verbal utterance, just as the verbal utterance represents and corresponds to the mental concept which applies to any one of the externally existing individuals. In the external world there exists no single entity that can be applied to individuals under which they can be said to be subsumed.58

Ibn Taymiyya's rejection of externally existing universals perfectly agrees with, and in fact goes further to enhance, his total opposition to the distinction drawn between quiddity and its existence, particularly its extramental existence. The essence, for him, is no more than a generalization or abstraction by the mind of externally existing individuals;<sup>59</sup> thus, an essence has no existence other than in the mind.<sup>60</sup> Accordingly, man *qua* man, or an absolute man or human, exists only as a mental concept.<sup>61</sup> From this it follows that all universals, be they natural, logical, or mental, have only mental existence, precisely like absolute existence when conditioned or

<sup>56</sup> Nagd al-Mantiq, 191, 194, 196; Muwāfaqat Sahīh al-Manqūl, i. 177.

<sup>57</sup> Tawhīd al-Rubūbiyya, 88, 94; Muwāfaqat Sahīh al-Manqūl, i. 65.

<sup>58</sup> Muwāfaqat Sahīh al-Manqūl, i. 129; Tawhīd al-Rubūbiyya, 158.

<sup>&</sup>lt;sup>59</sup> Tawhīd al-Ulūhiyya, 47; al-Radd, 118, 368; Jahd, 118, 238 (Translation, pars. 63, 64, 203, below).

<sup>60</sup> Tawhid al-Rubūbiyya, 163; al-Radd, 9.

<sup>61</sup> See his Furqān, 154; Tawhīd al-Rubūbiyya, 89; Muwāfaqat Sahīh al-Manqūl, ii. 236-7.

unconditioned by anything.62 If absolute existence is merely a mental concept, then the Necessary Existent does not exist in external reality. 63 This conclusion, in Ibn Taymiyya's view, not only demonstrates the confusion and absurdity of the philosophers and mystics who hold a realist theory of universals, but also places them within the pale of heresy and unbelief.<sup>64</sup>

To say that undermining the philosophical and mystical doctrine of absolute existence was less than crucial for Ibn Taymiyya would be to underestimate the metaphysical consequences of the realist theory of universals, at least as this theory or its ramifications were understood by our author. Refuting this theory was essential because such a refutation proved not only that the God of the philosophers and the mystics is a fabrication of their own minds and has no real external existence, but also prepared the ground for launching another level of criticism against what may perhaps be described as the two most fundamental doctrines of speculative mysticism, namely, the doctrine of 'fixed prototypes' and that of the Unity of Existence.

It is instructive to note here that Ibn Taymiyya's unrelenting attack on the philosophers was in fact double-edged. On the one hand, by refuting philosophical logic he advanced his critique of the metaphysical doctrines of falsafa, and, on the other, by undermining logic in general and the realist theories of essences and universals in particular, he sought to shake the dogmatic foundation of mystical pantheism. It is patently clear that Ibn Taymiyya held the philosophers—and, incidentally, the Jahmis, 65 whom he accused of stripping God of all attributes—responsible for the pantheistic heresies of Ibn Sab'ın, Qunawi, Tilimsani, Ibn 'Arabi, and their followers.66

The first of the two fundamental doctrinal principles upon which speculative mysticism in general and that of Ibn 'Arabī in particular

par. 84, below).

65 See Translation, par. 96, n. 1, below.

<sup>62</sup> Muwāfaqat Sahīh al-Manqūl, i. 174 ff., ii. 237; Tawhīd al-Rubūbiyya, 163 ff. 63 Muwāfaqat Sahih al-Manqūl, i. 128-9; Tawhīd al-Ulūhiyya, 47-8; Furqān, 118; Aqwam mā Qil fil-Mashī'a, 153.

Muwāfaqai Sahīh al-Manqūl, i. 129, 174; al-Radd, 138; Jahd, 130–1 (Translation,

<sup>66</sup> Tawhīd al-Rubūbiyya, 175.

was based is the postulate that non-existents are things that subsist in non-existence (al-ma'dūm shay' thābit fī al-'a'dam).67 This doctrine is directly connected with the Aristotelian and Avicennian conception of universals and, to a lesser extent, with the forerunner of this conception, the Platonic Ideas. 68 Also connected with this doctrine is the Ishraqi theory of universals which proclaims that universals exist in the external world as incorporeal substances which subsist in a separate non-material world of archetypes (alam al-mithal).69 Furthermore, Ibn Taymiyya associates a modified version of this doctrine with the Mu'tazilis and Rāfidis. 70 On the view of later speculative mystics, before coming into existence things in the external phenomenal world are potentialities in the mind of the Absolute. God's knowledge of these things, which Ibn 'Arabī called the 'fixed prototypes of things' (al-a'yān al-thābita), is identical with His knowledge of Himself, and thus they are both ideas in His mind as well as particular modes of the divine essence.<sup>71</sup> Now, Ibn Taymiyya understood Ibn 'Arabī to be saying that these prototypes of things as well as their quiddities are not created, and that the external existence of things is a quiddity added to their quiddities.<sup>72</sup> Such an understanding entails the conclusion, which Ibn Taymiyya must have been more than happy to reach, that the prototypes of things subsist outside God's mind, 73 thus making God less than the creator of the universe. This conception would certainly seem harmonious with Ibn 'Arabī's creed that things in the world cannot be changed, not even by God Himself. For this God, on this creed, is not the transcendent God of the monotheistic religions, but rather an Absolute Being who manifests Himself in all forms of existence in the universe.74

This theory of prototypes is inextricably connected with the second Sufi principle of the Unity of Existence. Here, external existence has no being or meaning apart from God, for God, the Absolute

8 Cf. Affifi, Mystical Philosophy, 51-2.

70 Tawhīd al-Rubūbiyya, 143.

72 Tawhīd al-Rubūbiyya, 144.

<sup>74</sup> Affifi, 'Ibn 'Arabi', 417, 420; idem, Mystical Philosophy, 54-7.

<sup>&</sup>lt;sup>67</sup> See Ālūsī, *Jala' al-'Aynayn*, 91, where Ibn Taymiyya's letter to al-Shaykh al-Manbijī is cited; *Tawhīd al-Rubūbiyya*, 143.

<sup>69</sup> Suhrawardī, Hikmat al-Ishrāq, 92-6, 154-62, 211 ff.; Heer, "Al-Jāmī's Treatise on Existence", 228.

<sup>71</sup> Affifi, Mystical Philosophy, 47 ff.; idem, 'Ibn 'Arabi', 412.

<sup>&</sup>lt;sup>73</sup> Ālūsī, Jala al-'Aynayn (Ibn Taymiyya's letter to al-Shaykh al-Manbijī), 92-3.

Existent, is the only real existence outside the mind. The world is merely a manifestation of the Absolute, and thus it is no more than an expression of divine external existence.<sup>75</sup> From the proposition that reality is one and indivisible,<sup>76</sup> it was easy to maintain, as Ibn Taymiyya did, that in the view of Ibn 'Arabī, Tilimsānī, and other pantheists, the existence of created beings is identical with the existence of the Creator, and that God is indistinguishable from that reality which is other than He.<sup>77</sup>

For Ibn Taymiyya, the theological and juristic ramifications of the doctrine of the Unity of Existence could hardly be more dangerous. Theologically, this doctrine, whether in its milder form expressed by Ibn 'Arabī or the more radical version espoused by Tilimsānī, Farghānī, and al-Sadr al-Rūmī, obliterated the distinction between cause and effect, primary and secondary, creator and created. In this doctrine, God becomes the universe, and the universe becomes God, and whatever attribute one cares to attach to created beings will be equally predicable of God. 78 This fact alone suffices to prove the heresies of these pantheists. 79 Moreover, from the juristic standpoint, obliterating the distinctions between God and the universe necessarily entails that in effect there can be no Shari'a, since the deontic nature of the Law presupposes the existence of someone who commands  $(\bar{a}mir)$  and others who are the recipients of the command  $(m\bar{a}'m\bar{u}r)$ , namely, God and his subjects.80 On these grounds, Ibn Taymiyya strongly charges all pantheists, including Ibn 'Arabī, with rescinding the Sharī'a.81

<sup>76</sup> Ibid. 410.

<sup>77</sup> Ālūsi, Jalā' al-'Aynayn (Ibn Taymiyya's letter to al-Shaykh al-Manbiji), 92; Ibn

Taymiyya, Tawhīd al-Rubūbiyya, 114, 124, 160; idem, al-Radd, 521.

80 Ibid. 114.

<sup>75</sup> Affifi, 'Ibn 'Arabi', 409-13.

<sup>&</sup>lt;sup>78</sup> In addition to attributes God associates with Himself in the Quran, Ibn Taymiyya characterizes God with certain attributes which he predicates of Him analogically (namely, through *tashkīk*). See his *al-Radd*, 156, 521; idem, *Jahd*, 145, 147 (Translation, pars. 111, 114, and notes thereto, below); Tahānawı, *Kashshāf*, i. 780–2, s.v. *al-tashkīk*.

<sup>79</sup> Tawhīd al-Rubūbiyya, 112-26.

<sup>81</sup> In what seem to be Ibn Taymiyya's earlier treatises, this accusation is directed against such pantheists as Şadr al-Dın al-Rūmī, Tilimsānī, and Sa'īd al-Farghānī, but to the exclusion of Ibn 'Arabī. See e.g. his letter to Manbijī in Ālūsī, Jalā' al-'Aynayn, 92-3, and his Muwāfaqat Ṣaḥīh al-Manqūl, ii. 56. But in Tawhīd al-Rubūbiyya, 114, he also includes Ibn 'Arabī ('wa-li-hādhā imtana'a al-taklīf 'indahu', i.e. Ibn 'Arabī). For Ibn 'Arabī's juridical doctrines, see Ghurāb, al-Fiqh 'inda al-Shaykh al-Akbar Muhyī al-Dīn Ibn al-'Arabī. For his critique of the legal schools and their fiqh, see Morris, 'Ibn 'Arabī's 'Esotericism': The Problem of Spiritual Authority', 46-64.

It is therefore not surprising that Ibn Taymiyya should equate the speculative mystics' damaging effects on the Sharī'a with the havoc wreaked by the Tatar invasion of the Eastern Caliphate. That Ibn Taymiyya thought the conscription of the masses in the cause of antinomian Sūfism to be as destructive as the Tatars' oppressive control of the community and its Law, easily explains the priority he gave to the refutation of the philosophical foundations of their doctrines.

5

Ibn Taymiyya considered the task of demolishing the methodological foundations of philosophy to be incomplete without demonstrating the weaknesses inherent in the syllogism and, more specifically, in syllogistic demonstration. Philosophy obviously rests on arguments, and all valid arguments, it was asserted as early as Aristotle, involve syllogistic reasoning.<sup>82</sup> Even more than his physics and metaphysics, Aristotle's theory of syllogistics and demonstration, which stands central in his *Organon*, remained predominant among later Arabic and non-Arabic philosophers. It was a number of the fundamental rules which govern this theory that Ibn Taymiyya set out to refute.

Aristotle defined the syllogism as 'discourse in which, certain things being stated, something other than what is stated follows of necessity from their being so'. 83 Demonstration, on the other hand, he defined as 'a syllogism productive of scientific knowledge, a syllogism, that is, the grasp of which is *eo ipso* such knowledge... [T]he premisses of demonstrated knowledge must be true, primary, immediate, better known than and prior to the conclusion'. 84

A syllogism, Aristotle further stated, is an inference in which the conclusion necessarily follows from two and only two premisses. 'Whenever three terms are so related to one another that the last is contained in the middle as in a whole, and the middle is either contained in, or excluded from, the first as in or from a whole, the extremes must be related by a perfect syllogism.'85 The three terms, by force of the *Dictum de omni et nullo*, thus require a pair of premisses. A syllogism consisting of one premiss, Aristotle explicitly

<sup>82</sup> Kneale and Kneale, Development, 99.

<sup>&</sup>lt;sup>83</sup> Analytica Priora, 24<sup>b</sup>18; Topica, 100<sup>a</sup>25. See also Joseph, Introduction, 225.

Analytica Posteriora, 71<sup>b</sup>18.
 Analytica Priora, 25<sup>b</sup>32 ff.

states, cannot result in a conclusion.<sup>86</sup> Furthermore, one of the two premisses must be affirmative and at least one must be universal. Without meeting these requirements a syllogism will be either impossible or irrevocably defective.<sup>87</sup>

According to this doctrine, then, the syllogism, when valid, has the following features. First, as stated in Aristotle's definition of the syllogism given earlier, all syllogistic arguments of the categorical type must produce new knowledge, or as he elsewhere stated, a syllogism 'makes use of old knowledge to impart new'. 88 Second, a syllogism must consist of no less and no more than two premisses, plus one premiss as a conclusion. 89 Third, it must contain at least one universal premiss. 90 These, of course, by no means constitute all the rules of the syllogism, though they are indeed indispensable for making a syllogism possible. All Arabic logicians writing in the Greek tradition have taken these rules for granted, 91 and the centrality of these rules meant that successfully demolishing them would certainly be sufficient to prove the invalidity or, at least, the uselessness of the syllogistic theory. This is precisely what Ibn Taymiyya set out to do.

6

It is significant that, despite his intense disapproval of Greek logic, Ibn Taymiyya insisted on, and never retracted, the proposition that the categorical syllogism is formally impeccable. We have no indication that he was aware of the now well-known critique made by Sextus Empiricus nearly six centuries earlier. The latter strongly argued, as in fact have several other philosophers more recently, that the syllogism involves a petitio principii, since the conclusion,

<sup>86</sup> Ibid. 34a15-17.

<sup>87</sup> Ibid. 41a6.

Analytica Posteriora, 71<sup>a</sup>5.
 Analytica Priora, 42<sup>a</sup>32.

<sup>&</sup>lt;sup>90</sup> Ibid. 41<sup>a</sup>6.

<sup>91</sup> Fārābi, al-Qiyās al-Saghir, 250-7 (English trans., 59-73); Ibn Sīnā, Najāt, 69-70 and passim; Ghazālī, Maqāṣid, 67-83; Rāzī, Lubāb al-Ishārāt, 30 ff.; Aḥmadnagarī, Jāmi', iii. 106-7, s.v. qiyās.

<sup>&</sup>lt;sup>92</sup> al-Radd, 293, 246 ff.; Jahd, 206-7, 217 (Translation, pars. 230, 253, below); Dabi al-Mantiq, 260.

<sup>93</sup> See n. 137 below.

<sup>&</sup>lt;sup>94</sup> See n. 137 below, and Dummett, 'Justification of Deduction', 300 ff.; Cohen, *Preface*, 25 ff.

which is to be proven, is already found (or at least implicit) in the premisses. <sup>95</sup> We are certain, however, that despite the constant preoccupation of medieval Muslim scholars with the issue of circular reasoning (dawr), Ibn Taymiyya seems never to have associated the syllogistic form of argument with circularity. This is somewhat surprising since, as we shall see, Ibn Taymiyya persisted in the view that in so far as things in the external world are concerned, the syllogism can lead to no new knowledge whatsoever; <sup>96</sup> in a syllogism treating of such existents there is nothing in the conclusion that is not already found in the premisses. The substantive arguments he adduced to vindicate this position could have been extended—I believe with relative ease—to a more serious charge that the syllogism inherently begs the question. But Ibn Taymiyya does not seem to have been ready to make such a categorical charge.

Why he did not make such a charge is not readily obvious. Ibn Taymiyya conceived the syllogism as an inference that may deal either with mental concepts or with things in the real, objective world. Mental concepts are ideas that can have no external existence, 97 such as, for instance, the rules of mathematics, geometry, and logic. The Law of the Excluded Middle, the Law of Contradiction, mathematical truths, and other similar principles, have no real ontological status apart from their existence in particulars. Yet because they are irrefutable as universal propositions, they can lead to knowledge of particulars subsumed under them. In other words, because, for example, the Law of the Excluded Middle is irrefutable without it being necessary to enumerate all the particular instances in the world falling under such law, we can derive new knowledge from this law about something that was not considered when the law came to be formulated in our minds. But since the Law of the Excluded Middle is entirely mental, any new knowledge that would be derived therefrom is also mental, teaching nothing about things existing in the natural world. Thus, by acknowledging the possibility of acquiring new knowledge by means of syllogistic reasoning, Ibn Taymiyya was not willing to accept the claim that the form of the

<sup>95</sup> Sextus argued that the major premiss can be established only by induction. Now, if induction is incomplete, the so-called universal premiss may prove false since it might be refuted by new evidence. But if the induction is complete, then the particular in the minor premiss must have been examined in order to establish the major.

al-Radd, 299, 355; Jahd, 218, 235 (Translation, pars. 256, 288, below).
 al-Radd, 299.

categorical syllogism entails the fallacy of a *petitio principii*. At the same time, however, Ibn Taymiyya could not see the utility of mathematical and logical knowledge for the human understanding of the real world. He simply dismissed this knowledge as irrelevant.<sup>98</sup>

The insistence upon the formal validity of the categorical syllogism was due not only to his conviction of the validity of the syllogism in mathematical and geometrical matters, but also of its validity when dealing with external existents. His argument that in such syllogisms there is nothing in the conclusion that is not already found in the premisses cannot, strictly speaking, be interpreted as meaning that a petitio principii is involved in these syllogisms, although, admittedly, a case for circularity can be made.

Syllogisms treating of matters in the external world do not yield new knowledge, on the grounds that the so-called universal premisses they contain are not truly universal. They are formed through an enumeration of particulars which, however numerous, can never be the entirety of the particulars existing in the external world. The formulation of a universal then proceeds from particulars to a universal, and then to the same particulars which were enumerated when the universal was formed. In these psuedo-universals, whenever a new particular arises, the universal is no more helpful in deducing an attribute found in that particular than is the particular in lending credibility to the universal. Hence, we can hardly learn anything about the particular through the universal without first learning something about the particular itself.

The sterility of the syllogism for studying natura rerum is then to be attributed to a problematic inherent, not in the formal structure of the argument, but rather in the epistemic value of the premiss which is claimed to be universal. Ibn Taymiyya retained the view that apart from the universal statements embodied in the revealed

<sup>98</sup> al-Radd, 135, 316; Jahd, 128, 221-2 (Translation, pars. 80, 265, below); Naqd al-Mantiq, 202. Ibn Taymiyya's interest obviously lies in what he called 'knowledge of external existents' ('ilm bil-mawjūdāt al-khārija), existents that are unique. This knowledge he considered beneficial because it is knowledge of God and of all mundane matters that are necessary for man to lead a lawful (shar'i) life. It must be understood that for him the purpose of human life is not a better understanding of the natural world in order to control nature and subject it to man's wishes (a vision that constituted the nerve of the Scientific Revolution in the West); rather, the human purpose lies in understanding the divine will in order that man may observe it and comply with it.

 <sup>&</sup>lt;sup>99</sup> Ibn Taymiyya, al-Radd, 113-14, 328, 355; idem, Jahd, 113, 235 (Translation, pars. 56, 288, below).
 <sup>100</sup> Ibn Taymiyya, al-Radd, 113-14; idem, Jahd, 113 (Translation, par. 56, below).

texts, all universal propositions uttered about things in the real world are formed through observation of particulars. 101 This empiricist attitude, however, raises a problem in Ibn Taymiyya's critique. Thus far we have seen him as an advocate of the position that the only non-divine, certain, and exhaustive universals are those employed in mathematics and geometry. And as a confirmation of this position we find him in one place declaring that mathematical principles, such as 'one is half two', are a priori, for God implants them in our souls upon birth. 102 Surely, a flagrant contradiction ensues from this assertion, since he also holds that all unrevealed universals are the result of generalizations made by the mind on the basis of empirical observations of particulars that share a certain attribute. A detailed analysis of the apparent contradiction will take us beyond the bounds of this introduction. I will only argue that one way out of this dilemma might lie in establishing a chronology for Ibn Taymiyya's relevant works. The statement concerning the a priori character of mathematical universals is found in Naqd al-Mantiq, a work whose contents point to a date of composition earlier than his al-Radd, where he set forth his arguments in the greatest detail. In the latter work we find a consistent empiricist view to the effect that all universal propositions, including mathematical and geometrical universals, are acquired through an empirical observation of particulars. 103 It is Ibn Taymiyya's thesis that aside from revelation all human knowledge begins with particulars. 104 The mind first conceives a particular 'one' and then judges it to be half of a particular 'two'. Such knowledge does not come into existence in isolation from the particulars found in the phenomenal world. Having observed that two equal parts of one thing constitute two halves, the mind, upon observing the recurrence of this phenomenon in a number of qualitatively different particulars, will form the generalization that one is half of two. 105 This conception accords with Ibn Taymiyya's cardinal principle that knowledge of particulars occurs in the mind

<sup>101</sup> Tawhid al-Ulūhiyya, 47; al-Radd, 316; Jahd, 223 (Translation, par. 267, below).
102 Naqd al-Mantiq, 202 ('al-badīhiyyāt, wa-hya al-'ulūm al-awwaliyya al-latī yaj'aluhā Allāh fī al-nufūsi ibtidā'an bi-lā wāsita, mithl al-hisāb, wa-hya kal-'ilm bi'anna al-wāhid niṣf al-ithnayn').

<sup>&</sup>lt;sup>103</sup> See e.g. al-Radd, 316-17, 363 ff.; Jahd, 222-3, 236-7 (Translation, pars. 267, 291, below); Hallaq, 'Ibn Taymiyya on the Existence of God', 58-66.

<sup>104</sup> See sources cited in previous note.

 $<sup>^{105}</sup>$  al-Radd, 315-16,  $10\hat{8}$ -9, 371; Jahd, 221-2, 107-8, 239 (Translation, pars. 264-7, 48, 295, below).

prior to knowledge of the universal, for one knows that ten pebbles is twice the number of five pebbles before knowing that every number is divisible by two and that any number is two times as large as either one of its halves. <sup>106</sup>

If we accept Ibn Taymiyya's position that all universal propositions represent mental generalizations formed on the basis of empirical observation of external particulars, then another difficulty arises with regard to reconciling this position with his earlier assertion that mathematical and geometrical universals do not involve a petitio principii since their truth does not depend on a complete enumeration of the relevant particular instances. Now, nowhere does Ibn Taymiyya address the difficulty as posed here. It is clear, however, that he does not develop a classification of universals into types, though he certainly thought of universal propositions as belonging to at least two categories: one is irrefutable, and the other is not. Mathematical principles belong to the former, while empirical propositions belong to the latter. Universal propositions about medical matters, grammatical rules, habitual events in nature, etc., can never be conclusive and irrefutable. 107 The mind cannot simply rule out the possibility of contrariety, such as in the case of the universal proposition 'All animals move their lower jaw when they chew', a proposition proven false by the fact that crocodiles move their upper jaw when feeding. 108 On the other hand, mathematical and geometrical principles are irrefutable, although the mind initially apprehends them by abstracting them from particulars in the external world. Ibn Taymiyya seems to have thought that, once abstracted, these propositions become virtually axiomatic in the mind, and are not susceptible to refutation. Unfortunately, however, we find no explanation as to why mathematical universals, unlike empirical propositions, become irrefutable despite the fact that both types of propositions are abstracted from particulars.

7

The philosophers' claims for the truth of the universal proposition in a categorical syllogism drew more than one critical argument from

<sup>106</sup> Tawhīd al-Rubūbiyya, 11.

<sup>107</sup> al-Radd, 328.

<sup>108</sup> Ibid. 208-9; Jahd, 196-7 (Translation, par. 211, below). See also Ghazālī, Magāsid, 89.

Ibn Taymiyya. In the first place, he insisted that all syllogistic reasoning about things in the external world proceeds from less than universal premisses, since the alleged universality of premisses in such syllogisms is established by incomplete induction. We shall see later how our critic employed this argument in his attack against the philosophers' doctrine which assigns to the syllogism a place logically and epistemologically superior to that of analogy. But even if we suppose, Ibn Taymiyya maintains, that such a premiss is indeed universal, the categorical syllogism remains none the less useless. The first of the two arguments he adduces to prove his proposition is one that derives from Islamic legal theory (usul al-figh), a theory that tends to view all syllogistic arguments of the categorical type, not as inferences, but rather as linguistic analysis of the particulars embedded in a universal statement. These particulars, however, are not to be found subsumed under the universal proposition through a middle term, since the very language expressing the proposition speaks of the predicate as applicable to every individual subsumed under the subject. 109 The implications of this view are clear: the universal premiss speaks of all its particulars without the need for a middle, <sup>110</sup> and this means that in an inference of the categorical type the minor premiss is superfluous. Indeed, even the conclusion amounts to little more than a particular emphasis upon the major, universal premiss. The conclusion 'Socrates is mortal' does nothing but emphatically particularize the fact expressed in the categorical premiss 'All men are mortal'.

Closely related to, if not part of, this criticism is an argument urged against the famous logical doctrine, first stated by Aristotle, that the premisses of the syllogism must ultimately originate in truths that are necessary and indemonstrable. It Ibn Taymiyya maintains that if the syllogistic premisses revert back to self-evident, indemonstrable truths, then all particulars subsumed under these truths are *a priori* self-evident and thus do not need a syllogism. It

The other argument he produces against the syllogism issues from his empiricist world-view, namely, that in the external world only individuals exist. It is the knowledge we acquire about these par-

See Hallaq, 'Non-Analogical Arguments', 287; Ibn Taymiyya, al-Radd, 151, 203, 361; idem, Jahd, 143, 190, 236 (Translation, pars. 108, 196, 290, below).
 al-Radd, 190-1; Jahd, 180 (Translation, par. 174, below).

<sup>&</sup>lt;sup>111</sup> Analytica Posteriora, 72<sup>b</sup>15 ff.; Bochenski, Ancient Formal Logic, 46.

<sup>&</sup>lt;sup>112</sup> al-Radd, 315-16, 363; Jahd, 221, 236-7 (Translation, pars. 264, 291, below).

ticulars that allows us to form the so-called universal propositions, not the other way round. Our knowledge then proceeds from the particular to the general, from the one to the many. The syllogism is thus useless since through it we are led to knowledge that we have already acquired from the particular. 113 We come to the knowledge that Socrates is mortal before we know that all humans are mortal.

It turns out then that in confirmation of the largely enigmatic acknowledgement of the formal validity of the categorical syllogism, Ibn Taymiyya apparently could not credit the syllogism with impeccable structure or semantic force. Indeed, by insisting on syllogistic entailment as a case of the obvious subsumability of individuals under the universal premiss, Ibn Taymiyya was able to dispense with the Dictum de omni et nullo, the backbone sustaining the categorical syllogism. Furthermore, doing away with the Dictum also enabled him to question another crucial requirement in the categorical syllogism, namely, that every syllogism must contain no more and no less than two premisses. As we have seen, he deems a truly universal premiss sufficient to yield a conclusion. He demands no other premiss for the inference because all the knowledge needed subsists in that universal premiss. 114 Yet, one premiss may not suffice if the reasoner finds himself in need of additional data in order to arrive at the required conclusion. Thus, the number of premisses in the argument is determined by the particular needs of the reasoner, needs that vary from one person to another. 115 Knowledge is so relative, he maintains, that the same matter may be quite self-evident for one person and not so for another. 116

That confining the number of premisses in the syllogism to two is arbitrary is proven, he asserts, by the logicians' recognition of the validity of both the enthymeme and the sorites. One of the major reasons given for the suppression of the premiss in the enthymeme is the fact that the premiss is obvious. 117 The suppression of one premiss owing to its clarity is proof that at times one premiss may be

<sup>114</sup> al-Radd, 190-1; Jahd, 179-80 (Translation, par. 174, below).

116 al-Radd, 167; Jahd, 159 (Translation, par. 137, below).

<sup>113</sup> al-Radd, 151, 251, 303, 361-2; Jahd, 143, 211, 221, 236 (Translation, pars. 108, 262, 290, 293, below).

<sup>115</sup> al-Radd, 167, 250, 251; Jahd, 159, 209-10, 211 (Translation, pars. 137, 237, 238, below).

<sup>117</sup> al-Radd, 187-8, 199; Jahd, 176, 186 (Translation, pars. 168, 186, below). The other reason usually given for suppressing the premiss is the reasoner's attempt to deceive his interlocutor.

all that is needed. At other times, however, even two premisses may be insufficient to yield a conclusion, and thus three or more premisses may be required. The need for more than two premisses is again attested by the logicians' acceptance of the sorites, <sup>118</sup> which is a compound syllogism consisting of a chain of syllogisms in which each term except the first and last occurs twice, once as subject and once as predicate. Thus, the sorites and enthymeme, in Ibn Taymiyya's view, make nonsense of the two-premiss stipulation. If all the premisses upon which the knowledge of the conclusion depends are to be mentioned, then the number of premisses may be only one<sup>119</sup> or it may exceed ten. <sup>120</sup>

8

Thus, the syllogism is open to criticism on more than one account, and as we have seen, the alleged universality of the syllogistic premiss seems to be most vulnerable. A complete induction of all particulars in the external world is postulated by Ibn Taymiyya as impossible, and thus cannot lead to a truly universal premiss or to certitude. The problematic nature inherent in the syllogism renders it hardly superior to analogy, since however valid the syllogism may be, it cannot, by virtue of form alone, lead to a certain conclusion. <sup>121</sup> It is the subject-matter of the argument, not its form, that determines the truth of the conclusion. If the form is irrelevant, and if the socalled universal premiss in the syllogism is not really universal, then how does the syllogism differ from analogy? Ibn Taymiyya answers that it does not. The syllogism does not differ from analogy except in form, and form, it has been said, is irrelevant to the acquisition of knowledge. Both analogy and the syllogism yield certitude when their subject-matter is veridical, and they result in mere probability when their subject-matter is uncertain. A syllogistic mode of reasoning will not result in a certain conclusion by virtue of form alone.

But what makes analogy and the syllogism equal? Ibn Taymiyya understands analogy in a more developed sense than do Aristotle

<sup>118</sup> al-Radd, 171; Jahd, 163 (Translation, par. 144, below).

<sup>119</sup> Ibn Taymiyya does not adduce a well-developed argument in favour of a one-premiss inference, although, like the author of *Naqd al-Nathr*, he advocated the possibility of an inference that is nothing but the hypothetical syllogism. See n. 128 below, and van Ess, 'Logical Structure', 40.

al-Radd, 172, 199; Jahd, 165, 186 (Translation, pars. 146, 186, below).
 al-Radd, 200-1, 211; Jahd, 199 (Translation, pars. 190, 216, below).

and other Greek logicians. By the century in which he lived, analogy had already generated one of the most sophisticated discussions Islamic legal theory—and for that matter the history of thought has ever known, and analogical reasoning was thus developed in an unprecedented manner. Moreover, and this is significant, Ibn Taymiyya was first and foremost a lawyer and jurist, and his worldview was considerably coloured by his characteristically juristic thinking. Now, legal analogy, the paradigm of all analogical reasoning in medieval Islam, was considered complete—but not necessarily valid-when it contained four elements: the original case, the assimilated case, the cause, and the judgement. 122 The original case (asl) represents the precedent. In the proposition 'Grape-wine is prohibited' there is given both the original case, grape-wine, and its judgement (hukm), namely, prohibition. The assimilated case is the new case for which the jurist seeks to formulate a judgement. If the assimilated case proves to be equivalent to the original case by way of sharing the same cause, then the judgement in the original case is transferred to the assimilated case. Again, the case of wine affords a basic example. Grape-wine was prohibited by the Lawgiver owing to its intoxicating quality. Accordingly, intoxication represents the cause. Date-wine is a novel case whose legal status is yet to be determined. Like grape-wine, date-wine possesses the quality of intoxication which we establish through sense perception. Having determined that intoxication, the cause of the judgement, is present in both date-wine and grape-wine, we transfer the judgement, namely prohibition, to date-wine. 123

The syllogism, on the other hand, consists of the same elements. The middle term in a syllogism is the cause in an analogy, and the major premiss, which contains the major and middle terms, is equivalent in an analogy to the concomitance (talāzum) or necessary relation between the cause, on the one hand, and the original and assimilated cases, on the other. Whatever is required to prove the truth and certainty of the universal premiss in a syllogism will be required to prove that the cause is for certain always concomitant with the judgement. 124 Put differently, the means through which we

<sup>122</sup> Discussions concerning legal analogy may be found in works of usul al-fiqh. On the four components of analogy (qiyās (al-tamthīl)), see e.g. Ibn Qudāma, Rawda, 283-7; Ibn al-Humām, Tahrīr, 419-21; Āmidī, Ihkām, iii. 9-10.

<sup>&</sup>lt;sup>123</sup> For this and similar examples see al-Radd, 211, 213; Jahd, 199-203 (Translation, pars. 216-18, 222-3, below).

<sup>&</sup>lt;sup>124</sup> al-Radd, 204, 211; Jahd, 191, 199-200 (Translation, pars. 200, 216, below).

establish the truth of the proposition 'All intoxicants are prohibited' are identical with those through which we prove that whenever there is a given intoxicant, prohibition is necessarily concomitant with it. In the same vein, the grounds on which the causality in a judgement may be refuted are identical with those on which the universality of the premiss of a syllogism may be questioned. If there is good reason to doubt the analogy 'Men are corporeal, analogous to horses, dogs, etc.', then there is as good a reason to doubt the major premiss 'All animals are corporeal'. 125 However, since in the external world we have no way of establishing with certainty any universal proposition, we are left with propositions containing only probable knowledge, regardless of whether these propositions are employed in a syllogism or in an analogy. But analogy, Ibn Taymiyya goes on to say, is surely more informative as it includes the mention of at least one particular upon which the conclusion is based, whereas the syllogism, also probable, makes no mention of particulars. 126

It is obvious that Ibn Taymiyya does not credit the syllogism with the ability to bring about certitude any more than he does analogy. On first appearance he seems to overlook the commonly held doctrine that even if the premiss in a syllogism is not universal, it stands, on the scale of probability, superior to analogy. While the latter, on this doctrine, proceeds from a single particular, the former is established inductively on the basis of a number of particulars. If Ibn Taymiyya did not subscribe to this doctrine it is because he, like all his fellow legists, refused to limit analogy to an inference which proceeds from one particular to another. Islamic juristic theory had already developed a variety of methods and procedures through which the cause of the judgement in the original case is established. 127 It was the task of these methods to verify the absence of another identical case or cases (particulars) in which the cause did not produce the same judgement. For if such a case does exist, the predication of the judgement in the original case becomes questionable, and the transfer of the judgement will not be possible. In the context of the syllogism, the existence of such a case means that the universality of the major premiss is highly dubious. Thus, establishing the universal character of the major premiss is equivalent to verifying that whenever there is a cause there is a judgement; and in the final

<sup>&</sup>lt;sup>125</sup> al-Radd, 213; Jahd, 202 (Translation, par. 222, below).

 <sup>126</sup> al-Radd, 205, 211-12; Jahd, 200 (Translation, par. 218, below).
 127 See e.g. Amidi, Ihkām, iii. 17-51, passim.

analysis an examination of other particulars (cases) is involved in both inferences. The difference, if any, between analogical and syllogistic verification is that in the latter the universal subject and predicate are completely abstracted from the particulars, while in the former the predicate is affirmed of the subject in so far as one actual case (particular) is concerned, though such an affirmation is possible only through an examination of a certain number of other relevant cases. The process may be different but the result is identical.

When Ibn Taymiyya spoke of the identical natures of analogy and the categorical syllogism, he was speaking of an analogy whose cause is established by methods which presuppose an inductive survey of all relevant particulars. This developed conception of analogy, together with his considered opinion that in the natural, objective world there can be only refutable universal propositions, amounts to a position—which he does, indeed, take—that analogy and the categorical syllogism are equivalent and interchangeable. In fact, he goes further and argues that not only may an analogy be converted into a syllogism in the first figure and vice versa, but an analogical or syllogistic inference can also be recast in the form of hypothetical and disjunctive syllogisms. <sup>128</sup>

Casting an inference in a formal or non-formal mode is possible, Ibn Taymiyya maintains, owing to the fact that the essence of any inference is not its form but rather the connection between the components within a proposition expressing certain relationships in the external world. Things in the world are concomitant, and there can be no external particular that is not concomitant or conjoined in one form or another with other particulars. Concomitance (talāzum) exists in degrees of strength, from the much-coveted certitude to the lower degrees of probability. If we know for certain that whenever A exists, B also exists, we can infer with all certainty that B exists since we observe A to be in existence. Conversely, if we know with the same certainty that when A exists B can never exist, we will be able to judge without a shade of doubt that B now does not exist since A exists. In these inferences, whatever the form, our conclusion will be probable if the relationship of concomitance between A and B is less than certain. 129

129 al-Radd, 206; Jahd, 193 (Translation, par. 204, below).

<sup>&</sup>lt;sup>128</sup> al-Radd, 201, 294-5; Jahd, 188 (Translation, par. 191, below). It is interesting to note that Lukasiewicz and Patzig have argued the equivalence of the categorical and the conditional syllogisms, but Smiley and Concoran have discredited their arguments. See Lear, Aristotle and Logical Theory, 8-9.

It would hardly be an overstatement to say that for Ibn Taymiyya the challenge facing the logician lies not in an investigation of forms, figures, and moods—which he repeatedly characterizes as far too prolix and otiose—but rather in arriving at the truth and certainty of propositions. For him, this is the question. It is also not an exaggeration to maintain that Ibn Taymiyya was an ardent sceptic, but a sceptic who was saved by religion. Our simple minds, he persistently held, cannot establish certainty and truth in the natural world. The only source of truth and certainty is revealed knowledge, knowledge conveyed to us by the prophets. 130

## II. Sources of the Critique

Ibn Taymiyya's ultimate goal was the demolition of the logical foundations of philosophical metaphysics and speculative mysticism, and he considered as a candidate for adoption any argument that proved appropriate and useful for achieving that end. But what were the sources of these arguments and to what extent was Ibn Taymiyya indebted to them? To answer this question it is necessary to begin where logic began, for shortly after their inception Aristotelian (and apparently pre-Aristotelian) and Stoic logic had their share of criticism from within the Greek tradition itself. It is with this criticism that we should begin to consider Ibn Taymiyya's possible indebtedness to his predecessors.

In his work Against the Logicians, Sextus Empiricus reports that as early as Socrates, logic—which kind we do not know—encountered the opposition of a number of Greek thinkers. The Cyrenaics, a school which appears to have risen from the teachings of Socrates, from which also emerged the school of Plato and his successors, apparently held that physics and logic have nothing to contribute to the happiness of life. <sup>131</sup> But this opposition appeared too early for Aristotelian logic to have been its possible object. Sextus similarly reports the disapproval of Epicurus and Archelaos of logic, although it is not clear what logic they opposed and on what grounds. <sup>132</sup>

Zeno's disciple, Ariston of Chios (fl. c.300 BC), also held logic to

132 Sextus, Against the Logicians, 9.

<sup>&</sup>lt;sup>130</sup> Tawhīd al-Rubūbiyya, 47; Muwāfaqat Sahīh al-Manqūl, i. 28-9; al-Radd, 472; Jahd, 250 (Translation, par. 315, below).

<sup>&</sup>lt;sup>131</sup> Sextus, Against the Logicians, 7, 103. On the scepticism of the Cyrenaics, see Groarke, Greek Scepticism, 72-7 and passim.

be unprofitable and injurious to those who study it, leading neither to virtue nor to the purification of the soul. It is significant that some of the statements made by Ibn Taymiyya are reminiscent of the sweeping condemnation of logic pronounced by Ariston ten centuries earlier. Consider the following comment of E. Zeller: <sup>133</sup>

Logic, as doing more harm than good, he compared to a spider's web, which is as useless as it is curious; or else to the mud on a road. Those who studied it he likened to people eating lobsters, who take a great deal of trouble for the sake of a little bit of meat enveloped in much shell. Convinced, too, that the wise man is free from every deceptive infatuation, and that doubt, for the purpose of refuting which logic had been invented, can be more easily overcome by a healthy tone of mind than by argument, he felt no particular necessity for logic. Nay, more, he considered that excessive subtlety transforms the healthy action of philosophy into an unhealthy tone.

Like Ariston, Ibn Taymiyya repeatedly remarks that logic is excessively prolix, unduly complicated, and tedious, and he too offers metaphors to illustrate this view. In lieu of seafood, his examples issued from desert animals. Logic, he thought, is like the flesh of a slaughtered camel found on the summit of a mountain; the flesh is not good enough to warrant climbing the mountain, nor is the road leading to it easy to follow. More important, like Ariston, Ibn Taymiyya constantly held natural, innate intelligence (fitra) to be sufficient for thinking and reasoning soundly, thus rendering logic superfluous.

About five centuries after Ariston of Chios, Sextus himself levelled a massive attack against Aristotelian and Stoic logic. His chief concern centred around truth, its criterion and its existence. He was a sceptic whose points of departure in such criticism shared no common ground with Ibn Taymiyya's basic assumptions. Any legitimate attempt at finding similarities will then have to be limited to two areas of enquiry, namely, the theory of signs and that of the syllogism. There is little doubt that Islamic scholastic theology as well as legal theory adopted an epistemic theory of signs that considerably resembled the Stoic doctrine. But the resemblance is significantly diminished in the case of Ibn Taymiyya and Sextus because the latter developed a theory of signs that was not only

<sup>&</sup>lt;sup>133</sup> Zeller, Stoics, 60.

<sup>134</sup> Naqd al-Mantiq, 155; Translation, par. 253, below.

<sup>135</sup> Jadaane, L'Influence du stoïcisme, 113 ff., 97; van Ess, 'Skepticism', 11.

different from that conceived by Ibn Taymiyya (and the Stoics), but was also largely irrelevant to Ibn Taymiyya's critique. More specifically, Sextus' dichotomous idea of commemorative and indicative signs represents a considerable advance over Ibn Taymiyya's notions of *dalāla*. <sup>136</sup> And in any case, Ibn Taymiyya does not seem to utilize these notions in any criticism that goes beyond asserting the superiority of Stoic conditional arguments to Aristotelian categorical syllogisms.

There is, however, one major similarity between Sextus' and Ibn Taymiyya's critiques, and that is their rejection of the syllogism. Sextus suggested that in the syllogism 'Every man is an animal; Socrates is a man; therefore, Socrates is an animal', we can establish the major premiss only through induction. If the induction is incomplete, then the examination of a new instance might prove it false; and if it is complete, then the conclusion must have been taken into account in formulating the major premiss. Therefore, Sextus concluded, the categorical syllogism is circular.<sup>137</sup>

As we have seen earlier, Ibn Taymiyya's critique of the syllogism distinguishes itself from the doctrine of Sextus in that it adopts a different approach in attacking the problem and takes a much wider view of the weaknesses of the syllogism. And, unlike Sextus, Ibn Taymiyya stops short of levelling a charge of circularity against the inference. But even if we assume that Sextus constituted a source of Ibn Taymiyya's criticism of the syllogism, we must insist that the latter critique represents a considerably transformed version of the Sceptic's views. Furthermore, it seems well-nigh impossible to establish any link between Ibn Taymiyya and Sextus. Just as we know of no doctrine or work attributed to Ariston of Chios to have survived in Islam, we have no evidence that any of the writings of Sextus were known to Muslims. Sextus' name is hardly ever mentioned in Muslim writings, and thus the only possible channel of influence conceivable is through indirect transmission of his criticism. The writings of the Sceptics, like those of the Stoics and the Sophists, were never transmitted to Islam in the manner in which Aristotle, for instance, was. What Islam received of Sceptic doctrines

<sup>137</sup> For a summary of Sextus' criticism, see *Encyclopedia of Philosophy*, v. 41, s.v. 'Logic, Traditional' (by A. N. Prior).

<sup>&</sup>lt;sup>136</sup> On commemorative and indicative signs, see Sextus, Against the Logicians, 313 ff.; Stough, Greek Skepticism, 125-37; Chisholm, 'Sextus Empiricus', 371 ff.; Mates, Stoic Logic, 13 ff. On dalāla, see Translation, par. 42, n. 2, below.

was both marginal and thin. As van Ess has aptly remarked, not only were the names of famous old Sceptics unknown to Muslims, but Scepticism as a whole appeared in Islam 'as an isolated flash of thought and as a rhetorical bluff'. We must therefore conclude that borrowing from the Greek sources must remain at best both indirect and insignificant.

It is perhaps more convincing to argue in favour of the rise of a native Muslim criticism of what was chiefly considered to be Aristotelian logic. Muslims generally had a better reason to attack this logic than their Greek predecessors since they construed it as posing a major threat to the fundaments of their faith. The criticism of logic had a long history in Islam before Ibn Taymiyya. It is here that we should look for influences on Ibn Taymiyya. Unfortunately, our data about writings critical of logic are so scant that we shall be able to draw no more than a general and tentative outline of this fascinating history.

The earliest Muslim critic of Aristotelian logic appears to have been the Mu'tazilī poet and thinker Abū al-Abbās al-Nāshi' al-Akbar, better known as Ibn al-Shirshīr (d. 293/905). <sup>139</sup> Although the substance of his criticism is virtually unknown, <sup>140</sup> it is significant that he was cited as a major critic of Greek logic by Abū Sa'īd al-Sīrāf1<sup>141</sup> in his celebrated debate with Mattā b. Yūnus, a debate well known to Ibn Taymiyya. <sup>142</sup> There is no evidence, however, to indicate that Ibn Taymiyya knew much of Ibn al-Shirshīr's criticism beyond the name of its author.

In contrast, Ibn Taymiyya was intimately familiar with what appears to have been a scathing and elaborate criticism of Aristotelian logic authored by the Shi'ī thinker Hasan b. Mūsā al-Nawbakhtī (died between 300/912 and 310/922). The treatise containing the criticism, Kitāb al-Ārā' wal-Diyānāt, also treats, as the title suggests,

<sup>138</sup> Van Ess, 'Skepticism', 2, 3.

<sup>139</sup> Van Ess, Mu'tazilitische Hāresiographie, 1 ff.

<sup>140</sup> Some of his arguments may be found in his al-Kitāb al-Awsat, 116-26, esp. 119-20. For a German translation with commentary, see van Ess, Mu'tazilitische Hāresiographie, 150 ff. However, these fragments shed no light on what is presumed to have been a more systematic critique of Aristotelian logic.

<sup>&</sup>lt;sup>141</sup> Tawhīdī, *Imtā'*, 124; and Iḥsān 'Abbās's introduction to Ibn Ḥazm, *Taqrīb*, 38; Zimmermann's introduction to *Al-Fārābī's Commentary*, pp. cxxii-cxxxiv, esp. cxxiv-cxxv.

<sup>142</sup> al-Radd, 178; Jahd, 171 (Translation, par. 159, below).

<sup>&</sup>lt;sup>143</sup> al-Radd, 331. See also Rescher, Development, 41; and Translation, par. 282, n. 3, below.

of several non-Islamic dogmas and religions, such as the Brahman and Magian creeds. 144 Nawbakhtī also seems to be the author of a no longer extant treatise entitled al-Radd 'alā Ahl al-Mantia, 145 which, judging from the title, is entirely dedicated to the refutation of logic. It is possible, however, that this work represents the logical part as extracted from the larger work Kitāb al-Ārā'. Be that as it may, Ibn Taymiyya acknowledged having read the latter work, 146 a fact that finds corroboration in the multiple quotations made by his student Ibn Qayvim al-Jawziyya. 147 But beyond the obvious debt to Nawbakhtı concerning the criticism of the number of premisses in the syllogism, a debt that finds ample attestation in a lengthy quotation in Ibn Taymiyya's critique, 148 we have no means of establishing, in precise terms, any further influences until such time as Nawbakhtī's work is recovered. However, if Nawbakhtī adduced further criticisms—and it is quite possible that he did—Ibn Taymiyya may have made use of them without acknowledging the source. In any case, the evidence available points in the direction of Nawbakhti's work as the earliest criticism known to Ibn Taymiyya.

I said that Ibn Taymiyya may—but not must—have made use of arguments included in Nawbakhtī's work, on the grounds that there is at least one instance where he was familiar with an attack against logic and logicians but simply chose, with minor exceptions, not to incorporate it into his critique. This attack was launched in 320/932 by the grammarian Abū Sa'īd al-Sīrāfī against the philosopher-logician Mattā b. Yūnus. 149 None of the main arguments set forth by Sīrāfī can be found in Ibn Taymiyya's work, and such criticism as that which stresses the conventional nature of logic and its incompatibility with the rules of the Arabic language 150 was made so often in medieval Islam that Sīrāfī's censure cannot claim any monopoly. At any rate, Ibn Taymiyya's concern with the relation of logic to grammar, and other cognate issues constituting the backbone of the Sīrāfī-Mattā debate, was indeed negligible.

The sparseness of primary sources renders difficult the task of

<sup>144</sup> See Ritter's introduction to Nawbakhtī's Firaq al-Shī'a, pp. kāf-jīm to kāf-zā'.

<sup>145</sup> Ibid., p. yā'-ṭā'.

<sup>&</sup>lt;sup>146</sup> al-Radd, 337-9; Jahd, 231-2 (Translation, par. 282, below).

<sup>147</sup> See e.g. Nawbakhtī, Firaq al-Shī'a, pp. kāf-jīm to kāf-zā'.

<sup>148</sup> al-Radd, 337-9; Jahd, 23I-2 (Translation, par. 282, below).

<sup>149</sup> See Translation, par. 159, n. 1, below.

<sup>150</sup> See, in particular, Mahdi, 'Language and Logic', 58-83.

establishing any debt to the writings of early theologians. Abū al-Hasan al-Ash'arī, the founder of the Ash'arī school of theology, is reported to have written Kitāb 'alā Ahl al-Mantiq (A Response to the Logicians). 151 But this book, as Rescher stated, seems to have been a refutation of Christian dogmas propounded by Christians who happened to be logicians. 152 Whatever the nature of the work, Ibn Taymiyya makes no reference to any logical criticism by Ash'arī, just as he makes no mention whatsoever of Ash'ari's contemporary, the Mu'tazilī Ibrāhīm b. 'Ayyāsh, who appears to have written against the demonstrative syllogism. 153 Nor does he mention the Jewish scholar Ya'qūb b. Ishāq al-Qirqisānī (fl. second quarter of the tenth century AD), who espoused the view that the syllogism yields no new knowledge, 154 a view we have seen to be central to Ibn Taymiyya's crītique. However, he is familiar with the polemical writings of the renowned Ash'arī theologian Abū Bakr al-Bāqillānī, particularly his treatise al-Daqaiq, in which he seems to have argued against the philosophers' metaphysics and logic. 155 Again, owing to the sparseness of sources, the identification of possible borrowings here is at present impossible.

We may also mention the well-known fatwā issued by Ibn al-Şalāh (d. 643/1245) against logic. 156 It is unlikely that Ibn Taymiyya did not know of this responsum. But even if we grant that he was familiar with it, there is very little in common between his massive work which was written in a critical and scrutinizing vein and the brief and narrowly legal contents of the responsum. Finally, we should draw attention to a highly interesting critique written by a certain Abū al-Najā al-Fārid, who is entirely unknown. 157 If the treatise can be dated earlier than the end of the seventh/thirteenth century, then there arises the possibility that Ibn Taymiyya may have been indebted to some aspects of al-Farid's refutation of the essentialist definition. For while most of the latter's criticism is not to be found in Ibn Taymiyya's work, there are similarities in the unfavour-

<sup>151</sup> Rescher (Development, 41) lists it on the authority of Wilhelm Spitta.

<sup>152</sup> Rescher, Development, 41. 153 Ibn al-Nadım, Fihrist, 246.

<sup>154</sup> Van Ess, 'Skepticism', 13.

<sup>155</sup> Naqd al-Mantiq, 196.

<sup>156</sup> See Ibn al-Salāh, Fatāwā, 32, 34-5; Goldziher, 'Attitude of Orthodox Islam', 205-6.

157 See Falātūrī's Persian introduction to the text, in Mohaghegh and Izutsu, Collected

Texts, 7-8. For the text, Khamsin Mas'ala fi Kasr al-Mantiq, see 13-60.

able attitude of both men towards the Aristotelian concept of the complete definition.

Difficult as it may be to establish specific debt to the various theological schools, Ibn Taymiyya could not have launched his attack against logic without drawing upon the earlier polemical writings of theologians, including those who were Shī'ī, Mu'tazilī, Māturīdī, or Ash'arī. That he derived material from a wide spectrum of theological schools which stood in blatant opposition to the Hellenic tradition of learning is expected. But Ibn Taymiyya did not limit himself to theological discourse: rather, he entered the abode of philosophy itself and selectively appropriated some of its own arguments and counter-arguments. Whether he adequately represented or misrepresented the metaphysical doctrines of the philosophers is a question worthy of an independent study. What we cannot question, however, is the fact that he was intimately familiar with a significant bulk of philosophical discourse. Even a preliminary reading of his works readily reveals that he had firsthand knowledge of the writings of Fārābī, Ibn Sīnā, Ibn Rushd, Suhrawardi, Abū al-Barakāt al-Baghdādī, Nasır al-Dīn al-Tusi, and Fakhr al-Dīn al-Razi, to name only a few major figures. 158 Interestingly enough, it is from these sources that he derived a considerable portion of his argumentation against logic.

We can identify two kinds of philosophical material that made itself useful to Ibn Taymiyya. The first, and perhaps less important, were the relatively short remarks made by these philosophers with regard to difficulties inherent in the logical and philosophical doctrines they were expounding. A case in point is Ibn Sīna's admission that real definitions are difficult, if not impossible, to formulate. <sup>159</sup> Admittedly, however, such admissions of weakness could not have supplied Ibn Taymiyya with any significant ammunition. The second, and main, source of ammunition he found in the philosophers' criticisms of each other's doctrines, in *ikhtilāf al-falāsifa*, so to speak. <sup>160</sup>

<sup>&</sup>lt;sup>158</sup> See Translation, pars. 18, 29, 76, 88, 103, 208, 281, below. Laoust (*Essai*, 84-6) discusses Ibn Taymiyya's knowledge of philosophical doctrines, including his familiarity with the philosophical novel *Hayy b*. *Yaqzān* and the political writings of Fārābī.

<sup>159</sup> Ibn Sīnā, *Hudūd*, 1-7 (French trans., 1-6); for another example (about the definition of the sun), see Translation, pars. 9 (and n. 2 thereto), 107, 135, 148; and Ghazālī, *Mi'yār*, 52.

<sup>&</sup>lt;sup>160</sup> Ibn Taymiyya had full knowledge of the refutations by philosophers of each other's doctrines. See the revealing passage in *Jahd*, 195 (Translation, par. 208, below). Laoust (*Essai*, 86) also observes the same characteristic in metaphysics, where Ibn Taymiyya plays the philosophers against each other.

Although it is not always possible to identify this sort of borrowing, we are able at least to establish that the writings of Suhrawardı, Abū al-Barakāt al-Baghdādı, and Fakhr al-Dīn al-Rāzı—writings which drew on a long tradition of philosophical and theological learning—provided him with some fundamental criticism. We can also mention, among others, Ibn Sīnā, who directed certain criticisms against his Greek predecessors. The borrowings from Suhrawardı, Baghdadī, and Rāzī, however, are far more evident, since all three were highly critical of earlier philosophical doctrines, and their writings were quite familiar to Ibn Taymiyya.

Having attempted to identify and document in the notes to the translation the arguments which Ibn Taymiyya owed or may have owed to these thinkers, we shall be content here to speak briefly of Suhrawardi, who was not only highly critical of the Aristotelian logicians but also espoused certain theories that are central to Ibn Taymiyya's methodology in general and his critique in particular. Though in his Mantia al-Talwihāt Suhrawardı expounds a theory of logic that is faithful to his Peripatetic predecessors, 161 in Hikmat al-Ishrāq he presents us with a critique of the Peripatetics with which, we have every reason to believe, Ibn Taymiyya was familiar. 162 Among Suhrawardi's arguments against the Aristotelians at least two deserve to be mentioned: the first is his vehement refutation of the essentialist definition, and the second, his uncompromising attack against Aristotelian and Avicennian realism, an attack that was motivated by an unrelenting nominalism. 163 It is this nominalist position, which rejected complete definition and a realist theory of universals, that constitutes the heart and soul of Ibn Taymiyya's critique. But Ibn Taymiyya's nominalism was not restricted to his critique of Greek logic. The dozens of published tomes and tracts he wrote on (or against) theology, law, mysticism, and countless other subjects betray a strict nominalist approach. It would be unreasonable to argue that he owed his nominalism exclusively to Suhrawardi, particularly since nominalistic tendencies do not seem to have been uncommon in the midst of Sunnī theology and theory of law. Accord-

<sup>162</sup> See al-Radd, 40, 125, 140, 148; Jahd, 95, 125, 133, 139 (Translation, pars. 29, 76, 88, 103, below).

<sup>16</sup>I Suhrawardī, Mantiq al-Talwīhāt, 7-8 (on essence and accident), 10 ff. (on predicables), 14 ff. (on definition), 27 ff. (on propositions), 46 ff. (on the syllogism). In the same vein he also wrote al-Lamahāt. See Farhān, 'al-Bahth al-Mantiqi', 76-100.

<sup>163</sup> Suhrawardī, Hikmat al-Ishrāq, 17-21. Now see Ziai, Knowledge and Illumination, 41 ff., 65, and esp. 78 ff.

ingly, we must conclude that while Suhrawardī's criticism may well have been a source for Ibn Taymiyya's attack on the essentialist definition, we have little reason to believe, in light of the larger context of Ibn Taymiyya's career and intellectual background, that he owed his nominalism exclusively to Suhrawardī or, for that matter, to any other single predecessor.

To sum up, on the basis of the meagre evidence available to us, we tentatively conclude that Ibn Taymiyya clearly owes a debt to his Greek and Muslim predecessors. But the degrees of influence vary from one source to another. The debt to the Greek sources, particularly to the Sceptics, who seem to have been more critical of logic than others, is not easily identifiable. Certain arguments against logic may have crept in as part and parcel of the Greek philosophical discourse transmitted to the Arabs. A more readily identifiable source of influence is the polemical writings of the theologians, who, like Ibn Taymiyya, had earlier stood in defence of Islam against the 'Greek heresies'. An equally, if not more, important source is the philosophers' criticisms of each other. The available evidence points to the contributions of Suhrawardi, Baghdadī, and Rāzī as major sources of Ibn Taymiyya's criticism.

Ibn Taymiyya's critique then represents not so much the culmination of a tradition of anti-logical discourse as an ingenious and creative selection of already existing but disparate arguments. It is not the culmination of a tradition because there was no such identifiable tradition which can be justifiably defined in terms of genre, movement, trend. Doubtless, Ibn Taymiyya approached the problem with an intellectual framework of his own, one that derived from, and was squarely based upon, his own notions of empiricism. The critique is thoroughly imbued with a peculiarly Taymiyyan methodology and epistemology. What Ibn Taymiyya did was to introduce a variety of arguments excerpted from a wide range of sources, and fit them into his own framework after having cut, changed, or transformed them according to a mould that met his particular needs. To be sure, a mere aggregation of these arguments could hardly amount to the coherent and effective critique that Ibn Taymiyya mounted. Without a theoretical framework capable of pulling together these arguments into a meaningful and consistent whole, the mere act of collecting criticisms from a disparate variety of sources could in no way be better than a collection of fossil material which once formed some sort of unidentifiable but now extinct animal. Ibn Taymiyya was able

to identify and in fact to draw a detailed picture of the animal while using the fossils excavated by the likes of Nawbakhtī, Suhrawardī, and perhaps Sextus. Ibn Taymiyya's genius does not lie in the particular arguments he adduced, though even here he was impressive; rather, his genius manifests itself in creating, from the material that consisted of these particular arguments, a complete, systematic, and coherent critique.

It is an instructive coincidence that virtually all the criticisms common to Ibn Taymiyya and the Greeks are also common, though in a more articulate manner, to Ibn Taymiyya and later European philosophers. Seen against a scale ranging from the rudimentary critique made by Ariston to the subtle and extensive arguments adduced by such later philosophers as the British empiricists, Ibn Taymiyya can be conveniently located in the second half of the continuum. The attacks against Aristotelian logic in Islam continued after Ibn Taymiyya, though they were not conducted with the extraordinary energy, vigour, and creativity demonstrated by Ibn Taymiyya. In the Christian West, on the other hand, the movement towards rejecting Greek logic seems to have begun sometime after Ibn Taymiyya's death. In the 1580s, William Temple enthusiastically advocated the views of Petrus Ramus (d. 1572), who had earlier defended the thesis that the entirety of Aristotle's doctrines are false and that his logic is artificial and intolerably and unnecessarily complicated. Logic, he asserted, must follow the natural movement of thought.164 During the same period, François Sanchez produced another attack on Aristotle, with particular emphasis on his syllogistic reasoning. The Aristotelian syllogism, Sanchez maintained, does not lead to the understanding of reality, and it is artificially and excessively occupied with verbal subtlety. 165

In the beginning of the seventeenth century the criticisms of Ramus and Sanchez were not without following. <sup>166</sup> Descartes, for instance, explicitly wrote:

I noticed that as far as logic was concerned, its syllogisms and most of its other methods serve rather to explain to another what one already knows, or even, as in the art of Lully, to speak freely and without judgment of what one does not know, than to learn new things. Although it does contain many

<sup>&</sup>lt;sup>164</sup> Quinton, Francis Bacon, 11; Encyclopedia of Philosophy, vii. 66-8, s.v. 'Ramus, Peter' (by W. J. Ong).

Butterfield, Origins, 110.

166 Quinton, Francis Bacon, 16.

true and good precepts, they are interspersed among so many others that are harmful or superfluous.167

Still later, several British philosophers, including J. S. Mill, G. Campbell, and Thomas Brown, voiced grievances against logic in general and the syllogism in particular. 168 Other empiricists espoused views quite similar to those of Ibn Taymiyya concerning the equivalence of analogy and induction. 169 The general similarities between these philosophers' criticisms and those of Ibn Taymiyya are too obvious to rehearse here.

It is a historical curiosity that it was British, not Muslim, philosophy which carried Ibn Taymiyya's methodology to its logical conclusion. What is interesting is not only the resemblance between the Taymiyyan and the British criticism, but the distinctly empiricist bent common to both. The empiricism which came to be regarded in the West as one expression of scientific enquiry was completely lost on the Muslims. Western science realized the value of empiricism and succeeded in sifting it out of theology and metaphysics. This process is best exemplified in the transformation from the empirical theology and metaphysic of Occam, F. Bacon, and Berkeley to the modern secular empiricism of A. J. Ayer. The Muslims, on the other hand, were not able to see the significance of Ibn Taymiyya's devastating attack against Aristotelian logic, let alone the extraordinary potential of his empiricist methodology. As is borne out in the later logical and anti-logical discourse in Islam, neither Ibn Taymiyya's critique nor the epistemology and methodology behind it were adequately appreciated. Such logicians as 'Abd Allah al-Jīlānī<sup>170</sup> represented a prevalent trend whose task it was to rebut objections directed against logic, but with the raw enthusiasm of a young student impatiently defending the teachings of his illustrious master. On the other hand, such Ibn Taymiyya loyalists as Suyūtī, who also enthusiastically pursued the anti-Aristotelian path, were able to produce only a shallow and ineffective critique which lacked a respectable methodology or theoretic. 171 On Suyūtī and his co-religionists both the

<sup>167</sup> Descartes, Discourse on Method, 14.

<sup>&</sup>lt;sup>168</sup> Dummett, 'Justification of Deduction', 300 ff., 305 ff., Encyclopedia of Philosophy, v. 41-2, s.v. 'Logic, Traditional' (by A. N. Prior).

169 Heer, 'Ibn Taymiyah's Empiricism', 113.

<sup>170</sup> See his al-Risāla al-Muhīta, 359-95.

<sup>171</sup> See Sawn al-Mantiq wal-Kalām. I was not able to consult his other work, al-Qawl al-Mushriq fi Tahrīm al-Ishtighāl bil-Mantiq.

substance of their predecessor's critique as well as his methodology and epistemology were lost.

# III. Ibn Taymiyya's Discourse

The discourse employed in Islamic positive law, legal theory, theology, and philosophy may be characterized as highly formal. The arrangement and classification of topics, chapters, sections, and subsections followed a certain logic and order. Subjects were divided into manageable units, and each unit was, as a rule, treated in full before the transition to another unit occurred. While cross-reference was unavoidable, repetition was rare. Authors, expectedly, employed the jargon special to the field within which they were writing, and the utilization of concepts and terminology belonging to another field of enquiry was by and large kept to a minimum. A glance at the works of Juwaynī the theologian, Ghazālī the lawyer, Āmidī the jurist, and Ibn Sīnā the philosopher is sufficient to make the point.

That Ibn Taymiyya rejected this established form of discourse should come as no surprise. His mission was unique, and the conventional, formal structure of the theological and philosophical treatise would not do. His goal was simple: to dissuade Muslims from the heretical beliefs of the Sufīs, philosophers, speculative theologians, the Shī'īs, and a score of other groups. If writing a treatise on divine matters was commonly considered a good reason to hope to attain a reward in the hereafter, Ibn Taymiyya thought that writing a treatise exposing the heresies of those whom he believed to be the enemies of Islam was likely to be doubly rewarded. There was no need to abide by the systematic and orderly mode of exposition. Cross-reference and repetition became not only unavoidable but necessary. The aim was not merely to spread and articulate knowledge but to convince believers who had gone astray. His, then, was a mission whose aim was persuasion, if not outright dissuasion.

The particular purpose behind Ibn Taymiyya's mission explains three conspicuous features of all his writing. The most striking of these features is the uncontrollable penchant for digression. He could never resist the urge to move into another, albeit related, issue

<sup>&</sup>lt;sup>172</sup> That he thought so, we deduce from, among other things, his letter to his mother. Cited in Abū Zahra, *Ibn Taymiyya*, 63-4.

before offering a full treatment of the issue with which he began. This he seems to have done because priority was given to showing the weaknesses of one doctrine or another, not to the elaboration and development of a doctrine of his own. Nowhere, for instance, does he offer a discussion of universals without hastening to attack the philosophical and mystical doctrines that were based on a realist theory of universals. 173 While this mode of discourse apparently fulfilled his own needs as a critic and reformer, it leaves the modern reader with a sense of frustration. Ibn Taymiyya's digressive mode of discourse means that the treatment of a particular issue may often not be found in any one chapter, or even in any one work. The search bearing on an issue takes one through the entire treatise, if not through several other tracts and tomes. Some two dozen treatises of his must be consulted in order to establish, for instance, his views on the problem of God's existence. 174 We are therefore fortunate to find in a single treatise a comprehensive catalogue of what seem to be all the arguments Ibn Taymiyya adduced against logic.

The second feature of Ibn Taymiyya's work is repetition, a feature that becomes not only often unavoidable as an accompanying consequence of digression, but also indispensable in a discourse whose aim is to convince, dissuade, and recruit.

A third characteristic feature of his work is the imbalance between the criticism he advanced (why 'P is Q' is false) and the solutions he proposed as a substitute for what he thought false (why 'P is S' is true). In his preoccupation with launching attacks on his adversaries, leading to digression into what he perceived to be issues whose immediate introduction to the discussion would win him points against his foes, Ibn Taymiyya seems to have been unable to dwell in any one place on the issue he was discussing or to force himself to ask questions he may have answered. As a critic he no doubt excelled, but he was no systematic and organized writer. I have said 'writer' in preference to 'thinker' advisedly, since what becomes registered discourse must not necessarily be taken to represent the ideas in the mind of the author. We have no proof that Ibn Taymiyya was interested in constructing a system of logic which would replace that of the Peripatetics. His methodology and epistemology—which partly derived from the then prevalent theological and legal doctrines, but

<sup>173</sup> See Sections 3 and 4 of Part I, above.

<sup>174</sup> See Hallaq, 'Ibn Taymiyya on the Existence of God'.

to no small extent were his own—he modestly thought to have come down from the *salaf*. The task he assigned himself was confined to demolishing logic, and this fact clearly dictated his mode of discourse. In his case a systematic and complete presentation of a body of thought was not a significant concern.

Ibn Taymiyya's critique may then be characterized as a set of arguments whose ultimate goal is to undermine the validity of the philosophical, and consequently mystical, postulates making up, and deriving from, logic. These arguments were intended to create an aggregate effect; no single argument in the work could, or was expected to, deal a coup de grace to logic. Against the most central postulates upon which this discipline is founded, Ibn Taymiyya marshalled a legion of arguments that were intended to enhance and corroborate each other. Each argument was thought to carry an independent weight, and therefore the more arguments that were adduced the stronger the case against logic became. 175 When refutation of a postulate required the refutation of a sub-postulate, another group of corroborative arguments was introduced. Frequently, he informs us that against such-and-such a postulate he will advance a certain number of objections; and the aggregate of these objections was intended to constitute his response to that particular postulate. At other times, he integrates into one lengthy argument a variety of sub-arguments that are of a different type altogether. A substantive argument may thus be combined with a religious or a historical one. 176 The point is that Ibn Taymiyya consistently attempted to bring about a cumulative and corroborative effect.

<sup>175</sup> On the significance of corroboration in Islamic thought, with special reference to jurisprudence, see Hallaq, 'Inductive Corroboration', 3-31.

<sup>176</sup> It is possible to categorize arguments in a number of ways, one of which is according to their logical structure. Another categorization may issue from the content of arguments, not their form. The first category that makes itself evident in Ibn Taymiyya's work is the substantive argument, since the critique itself is a substantive one: it attacks statements and assumptions as propositions containing concrete ideas, and the attacks themselves consist of counter-ideas of the same order. The dominant arguments of the critique belong to this category. Another type is religious. Arguments belonging to this class are few in number, but their weight must not be underrated. They are consistently introduced as subsidiary arguments, and never as self-sufficient. Their significance lies in the fact that they are rooted in wider assumptions that define and prejudge the position of the opponent. One such central assumption is the superiority of the truth as carried by Judaism, Christianity, and particularly Islam over the truth of non-religionists: though the Jews and Christians have corrupted their own religions, they remain superior to Aristotle, who was nothing but a godless man. But the most superior of all religions is Islam, whose truth is manifest. The superiority of

### IV. The Arabic Texts

Two centuries after Ibn Taymiyya's death, 'Abd al-Rahmān Jalāl al-Dīn al-Suyūtī (d. 911/1505), an Egyptian Shāfi'ī scholar, found in Ibn Taymiyya's refutation of logic a tool that would serve his purpose in the debate about the scholarly credentials required to qualify a jurist to rise to the rank of mujtahid. 177 A group of scholars, ostensibly supporters of the Greek logical tradition, 178 maintained that a knowledge of logic constituted one of the prerequisites for exercising ijtihād. 179 Following in the footsteps of Ibn Taymiyya, Suyūtī argued that logic is not a requirement on the ground that it is not a sound discipline. 180 But a mere dismissal of this requirement was too facile and cryptic to be sufficient. He had to vindicate his claim, and he did so by writing two treatises of his own in refutation of logic, namely, al-Qawl al-Mushriq<sup>181</sup> and Sawn al-Mantiq. 182 Moreover, he abridged

Islam would have been a sufficient argument against the Greek doctrines had these doctrines not penetrated the Islamic sciences. The somewhat embarrassing fact that more than a few major Muslim scholars writing in the most traditional religious sciences resorted to Greek logic certainly blunted Ibn Taymiyya's religious argument. This may in part explain why this type of argument does not stand as self-sufficient, though it permeates the spirit of the critique. I say 'in part' because the chief reason for resorting to the rational, non-religious argument (al-dalıl al-'aqlī) was the position adopted by the great majority of Muslim intellectuals—that the best weapon against rational arguments must come from reason, not revelation, and Greek logic was, in the final analysis, a product of reason (see Translation, par. 210, below).

There can be identified further types of arguments that also played a subsidiary role in the critique. Ad hominem arguments such as those attempting to smear the characters of Aristotle and Ibn Sīnā are but one example. That Aristotle never visited the 'land of the prophets' and thus was not exposed to their teachings is corroborative, in Ibn Taymiyya's discourse, of the fact that his logic and metaphysics were erroneous (see Translation, par. 90, below; the point is further elaborated in Mufassal al-l'tiqād, 136). Ibn Sınā's affiliation with the Ismā'ilıs (ibid.) was also so construed, an affiliation that prevented him from being exposed to the divinely guided doctrines and behaviour of ahl al-sunna wal-iamā'a.

177 See Translation, par. 1, n. 1, below. For Suyūṭī's problem, see also Hallaq, 'Was the Gate of Ijtihad Closed?', 27-8.

<sup>178</sup> Exceptions, however, could be found. Ibn Qudāma, a traditionalist Hanbalī jurist, prefixed his usul al-figh work with a logical introduction, thus implying, like his forerunner Ghazāli, that logic is indispensable for legal reasoning. See Rawdat al-Nāzir, 13-30.

179 This requirement had a long-standing tradition in Islam. See Translation, pars. I, n. 1, and 160, n. 1, below.

Although he still claimed that he was adept in this art. See his Sawn, 1.

181 Full title: al-Qawl al-Mushriq fī Taḥrīm al-Ishtighāl bil-Mantiq. See Brockelmann, Geschichte, suppl. ii. 189 (169gg).

Published by Nashshār together with the 1947 edition of Jahd al-Qariha. See list of References below.

Ibn Taymiyya's al-Radd, apparently to render it more accessible to the interested student, 183 with a view, however, to bolstering his own claims against logic through the magisterial authority bestowed by his Ḥanbalī predecessor.

Suyūtī abridged the approximately 138,000 words of al-Radd to about 32,000 words under the title Jahd al-Qarīḥa fī. Tajrīd al-Nasīḥa. A literal translation of the title would be The Exertion of Effort in Divesting the Naṣīḥa, the Naṣīḥa being the alternative title of al-Radd, namely, Naṣīḥat Ahl al-Imān fī al-Radd 'alā Mantiq al-Yūnān. 184 Now, 'divesting' in the title of the abridged work refers to extracting the logical content from al-Radd, which is, from the viewpoint of the logician, thoroughly encumbered by metaphysical discussions. And this is precisely what Suyūtī successfully did.

Since Suyūtī was not interested in abridging the logical content of the work but only in eliminating repetition together with the greatest bulk of metaphysical discussions therein, he did not reformulate Ibn Taymiyya's text in his own words. In other words, his abridgement is not paraphrastic: he simply left the logical parts intact and deleted the greatest part of metaphysical digressions. And by omitting a good deal of repetition from the logical discussion he succeeded in creating a sequence of ideas that is superior to that found in al-Radd. One may assert that the overall result of Suyūṭī's abridgement is a more effective critique of logic than that originally formulated by Ibn Taymiyya. <sup>185</sup>

Despite the efforts expended in abridging al-Radd, Suyūtī was still unable to rid the text of the vexatious problem of repetition, and of this he was fully aware. Another related problem which seems to have escaped the attention of Suyūtī is the frequent use of the formula 'what we mean to say', or 'what is intended here' (wal-maqsūd (hunā)), a formula used by Ibn Taymiyya to indicate that he was reverting back to the logical discussion after having lapsed into a lengthy comment on other, mainly metaphysical, matters. While the repeated use of the formula may be justifiable in light of Ibn Taymiyya's practice of digression, it is no longer relevant to an abridgement which claims to, and in fact does, eliminate a significant

Brockelmann, Geschichte, suppl. ii. 124.
 Others have expressed similar opinions. See Brunschvig, 'Pour ou contre', 326; van Ess, 'Logical Structure', 50.

<sup>&</sup>lt;sup>183</sup> See Translation, par. 1, below.

On this problem, see Jahd, 254 (Translation, par. 322, below).

part of material that bears little on the logical issues at hand. All these, however, are minor shortcomings and should not detract from Suyūtī's contribution towards providing a more readable and succinct treatise.

In 1947, 'Alī Sāmī al-Nashshār published the text of Jahd for the first time. He relied on a single manuscript found in Dar al-Kutub al-Azhariyya (Majmū' 204), although he was aware of the existence of another manuscript in the Library of the University of Leiden, 187 this being the only other copy known to be extant. 188 Two years later, in 1949, 'Abd al-Samad al-Kutubī published the unabridged version of al-Radd in Bombay on the basis of a unique manuscript extant at the Khizānat al-Kutub al-Āsafiyya (Kalām 219) in Haydarabad. 189 Reportedly, this manuscript, an autograph, was brought into India from Yemen over a century ago by Nuwwab Siddig Hasan Khan (d. 1307/1889) where it was in the possession of Zaydī Imāms. 190 Kutubī, encountering several difficulties in the Āsafiyya manuscript, sought the help of Nashshār's edition, from which, Kutubī acknowledged, he benefited. 191 This was possible because Suyūtī's abridgement does not alter or paraphrase Ibn Taymiyya's words and sentences; hence, one manuscript could significantly inform the other concerning a substantial part of the logical subject-matter. In his edition, however, Nashshar did not benefit from the unabridged manuscript of Haydarabad. But the later edition of 'Abd al-Rahmān Ibn Qāsim and his son Muhammad did. The latter reprinted Nashshār's edition in 1961 in Rabat as part of volume ix in the thirty-seven-volume collection of Ibn Taymiyya's works. 192 The editors do not care to tell us anything beyond the fact that the work is based on a previously printed text of Jahd. 193 Nor do they tell us what corrections to the manuscript they made and the bases of such corrections. However, we have two good reasons to believe that the edition they depended upon was that of

<sup>&</sup>lt;sup>187</sup> See Voorhoeve, *Handlist*, 248-9; and Nashshār's introduction to the 1947 edition of *Sawn* and *Jahd*, p. zā', reproduced in Su'ād 'Abd al-Rāziq's edition of the same work, p. 17; Mustafā 'Abd al-Rāziq, *Faylasūf al-'Arab*, 124. Goldziher also announced the existence of this manuscript in his article 'Stellung der alten islamischen Orthodoxie', published as early as 1916 (English trans., 'Attitude of Orthodox Islam', 207).

<sup>188</sup> See Brockelmann, Geschichte, suppl. ii. 124 (no. 93).

See ibid., and the editor's introduction to al-Radd, pp. zā' to mīm.

<sup>190</sup> See Sulaymān Nadvī's foreword to al-Radd, p. qāf.

<sup>191</sup> See his introduction to al-Radd, p. sin.

<sup>192</sup> Entitled Majmū' Fatāwā Shaykh al-Islām 'Ahmad Ibn Taymiyya.

<sup>193</sup> See the introduction to vol. i. of Majmū', p. mīm.

Nashshār and the corrections they implemented were based on the Bombay edition. First, no editions other than those of Nashshār and Kutubī are known to have been published in or prior to 1961. These two editions have also become reputable and standard among Middle East scholars. Even if we assume the unlikely, namely, that there might have been other editions, it would have been considered quite injudicious on the part of the editors to resort to poorly received or lesser-known editions. Second, the Rabat edition at times commits the same errors found in Nashshār's edition, errors that are peculiar to the latter edition and which can be found neither in the unabridged work nor in the Leiden manuscript. 194

Since 1961, Jahd and Radd have both been edited once more. The latter was published in 1977 in two volumes, <sup>195</sup> of which I was able to obtain only the first. This edition, also based on the unique Asafiyya manuscript, does not appear to make a significant advance over the 1949 edition. But more relevant to our concern is the 1970 Cairo text of Jahd, edited by both Su'ad 'Abd al-Raziq and, presumably, Nashshār himself. 196 In reality, Nashshār was not involved in any collaborative effort with 'Abd al-Raziq beyond providing her with his 1947 edition, which she used, supposedly, as a starting-point. Her contribution consisted in collating Nashshār's edition with both the original manuscript in Dar al-Kutub al-Azhariyya and the Bombay edition of the complete work. Furthermore, she redivided Nashshār's text into smaller paragraphs, the latter's division being indeed cumbersome. Unfortunately, 'Abd al-Rāziq can be said to have completely failed to provide us with a credible edition. Not only does she take no note whatsoever of the Leiden manuscript, but her work is distressingly replete with misprints and errors.

<sup>194</sup> See e.g. the Rabat edition, p. 121 (l. 12): in 'innamā dhālika yaḥṣul fī al-mithāl al-ladhī lā yaḥṣul bihi...' the negative particle lā was omitted following the edition of Nashshār, p. 235 (ll. 7-8). In the Leiden manuscript, fol. 144 (l. 22), and the Bombay edition of al-Radd, p. 121 (l. 14), the negative particle was retained. A more obvious omission unique to both editions is to be found on p. 140 (l. 7) in the Rabat edition and p. 251 (l. 3) in Nashshār's edition. There, nearly two lines were omitted from both texts, whereas the Leiden manuscript and al-Radd contain them.

Edited by Muḥammad 'Abd al-Sattār Nassār and 'Imād Khafājı.
 Published together with Suyūti's Sawn al-Mantiq wal-Kalām 'an Fannay al-Mantiq wal-Kalām, by Dār al-Nasr lil-Tibā'a. I am indebted to Professor Aron Zysow for providing me with a copy of this edition.

#### V. Notes on the Translation

For the translation I have used the Rabat edition since it has proven superior to Nashshār's edition and certainly to that of 'Abd al-Rāziq. I have constantly referred to the Leiden manuscript<sup>197</sup> as well as the Bombay edition for collation with the present edition, though Nashshār's edition was by no means neglected. Suyūṭi's introduction to the abridgement (pars. 1-2) was omitted in the Rabat edition, but I have restored it using both Nashshār's edition and the Leiden manuscript. Also omitted was Suyūṭī's colophon, which I have also recovered from the same sources. Apart from these two additions, I have noted all corrections as well as the bases of these corrections towards the end of this volume (see Emendations to the Arabic Text).

The paragraphing of the Rabat text has been considerably changed. In the translation I have redivided the text into consecutively numbered paragraphs (1-323). The List of Paragraphs at the end of the volume offers the corresponding page and line numbers in the 1961 Rabat edition and the 1949 unabridged Bombay edition as well as the folio and line numbers in the Leiden manuscript.

I have also deviated in part from Ibn Taymiyya's division of the text into fusūl (sing. fasl = chapter). All fusūl indicating the chapters in which he refuted the four major logical propositions have been retained (see the headings of pars. 6, 17, 41, and 230). The rest of the fusūl are three, and were subsumed by Ibn Taymiyya under the third fasl, namely, the Third Point. These were obviously intended as sections or sub-chapters rather than as independent chapters. Since the subject-matter under each of these sections does not pertain to single, self-contained issues, the three subheadings have been omitted altogether. In the translation they would have fallen at the beginning of paragraphs 119, 137, and 211 respectively.

Words in square brackets represent my own insertions, which I found at times quite necessary for a better rendering of the text. Parentheses are, as a rule, used for the equivalent Arabic terms in

<sup>197</sup> See Voorhoeve, *Handlist*, 248-9. The manuscript (Or. 474 (20) in the Library of the University of Leiden) consists of 69 folios, each containing 31 lines with an average of 15 words per line. The copying of the manuscript was completed on the third of Ramadān 987 (22 Oct. 1579) by a certain 'Alī b. 'Alī al-Būsīrī al-Azharī al-Shāfi'ī.

Ibn Taymiyya's text. On rare occasions they serve as parenthetical punctuation.

For the Quranic verses cited in the text, I have most often depended on both Arberry's and Pickthall's translations. At times I have used a synthesis of these two elegant renderings, and at others made slight changes therein in order to convey more precisely the intended meaning. In just a few instances, however, I deemed it necessary to give my own translation.

Finally, it must be noted that I have attempted to document all the arguments cited by Ibn Taymiyya in the name of the philosophers, theologians, Sūfīs, and others. When Ibn Taymiyya tells us, without naming any one thinker in particular, that the logicians or philosophers held a certain doctrine, I have provided a reference to the discussion in the authoritative works in the field; for example, for metaphysical and logical doctrines, I have referred the reader to such authorities as Ibn Sīnā, Fārābī, Ghazālī, Ibn Rushd, Tūsī, Fakhr al-Dīn al-Rāzī, and Ibn Malkā. When a logical doctrine is cited by Ibn Taymiyya on behalf of the logicians, I have also attempted, to the best of my ability, to point out the extent to which our author was faithful in conveying that doctrine. (It will hopefully become clear in the course of the commentary on the text that Ibn Taymiyya has at times exaggerated the claims of the logicians.) I have not made this comparison, however, in the case of metaphysical or theological doctrines, since metaphysics and theology are not deemed to be at the centre of the treatise as abridged by Suyūtī.

# Taqī al-Dīn Ibn Taymiyya's Jahd al-Qarīḥa fī Tajrīd al-Naṣīḥa

An Abridgement by Jalāl al-Dīn al-Suyūţī

## In the Name of God, the Merciful, the Compassionate

- 1. Thanks be to God, who sent the honourable messengers with pure laws, and peace be upon our master Muhammad, who is supported by clear and manifest miracles, and upon his noble and good family and companions. To proceed: in both the past and in recent times people have criticized and disapproved of logic, and have written books to condemn it, invalidating and refuting its principles and demonstrating their falseness. The last of those who wrote on this subject is the sage of Islam, one of the mujtahidun, Taqī al-Dīn Ibn Taymiyya. He has two books on the subject: one is small,<sup>2</sup> and I have not seen it; the other is a volume in twenty fascicles he entitled Nasīhat Ahl al-Īmān fī al-Radd 'alā Mantig al-Yūnān.3 I wanted to abridge it in a few fascicles in order to facilitate its understanding for [both] the student and the learned. And so I undertook this task and have entitled the work Jahd al-Qariha fi Tajrīd al-Nasīha,4 and God is the guide to that which is right.
- 2. In the beginning of his book which he entitled Nasīhat Ahl al-Imān fī al-Radd 'alā Mantiq al-Yūnān, the sage of Islam, one of the mujtahidūn, Taqī al-Dīn Ahmad Ibn Taymiyya said:
- 3. To Proceed, I have always known that Greek logic is neither needed by the intelligent nor of any use to the dullard. However, I used to think that its propositions were true, since we have indeed

1 Sing. mujtahid, a religious scholar who is qualified to undertake ijtihād, namely, legal reasoning on the basis of the Quran, the Sunna, and consensus for the purpose of arriving at legal judgements (ahkām) of hitherto unsolved cases. In contrast with the muqallid, who follows the legal judgements of a mujtahid without undertaking independent legal reasoning, the mujtahid ranks high in the hierarchy of the legal profession. Further on the technical meaning of ijtihād, see Tahānawī, Kashshāf, i. 198-9, s.v.

<sup>2</sup> Ibn Taymiyya wrote several short treatises in refutation of Greek logic, most of which are published together with Suyūtī's abridgement as vol. ix of Ibn Taymiyya's Majmū' Fatāwā. The longest of these treatises, however, does not exceed a few pages. Suyūtī's reference must then be to Ibn Taymiyya's Nagd al-Mantiq which, despite its title, consecrates only about forty pages (out of 211) to a substantive refutation of logic. The rest is mostly a theological attack levelled against philosophers, speculative theologians, and other groups. See also Ibn Qayyim al-Jawziyya, Ighātha, ii. 256, where he observes that Ibn Taymiyya wrote two treatises in refutation of Greek logic.

The same as al-Radd 'alā al-Mantiqiyyīn. See Brockelmann, Geschichte, suppl. ii. 124, and Introduction, Part IV, above.

4 See Introduction, Part IV, above.

seen many of them to be true. Later on, it became clear to me that some of its propositions were false, and I have written something to that effect. When I was in Alexandria, I met one of those who glorify the philosophers<sup>2</sup> by exaggerating their importance and by imitating them, so I mentioned to him some of what they deserve by way of exposing their ignorance and errors. This encounter resulted in my writing down, in a session during one afternoon, the substance of my lectures about logic at that time,3 though doing so was not my intention, for my aim was to write about their metaphysics. But it has become clear to me that much in their views on logic is the source of their errors in metaphysics, such as their theory of quiddities being composed of attributes they call essential; their discourse about confining the means of acquiring knowledge to the definitions, syllogisms, and demonstrations they have expounded; their theory of definition by means of which concepts are formed; and their theory of the forms of the syllogism and their apodictic subject-matter.4

3 <sup>1</sup> Cf. Mufassal al-l'tiqād, 27, where Ibn Taymiyya tells us that in his teenage years

he was already aware of the problematic nature of Greek logic.

<sup>3</sup> In al-Radd (p. 3, l. 13), Ibn Taymiyya remarks that he completed the work in later

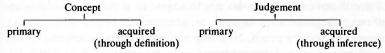
sessions.

<sup>&</sup>lt;sup>2</sup> The term for philosophers here is not the commonly used falāsifa but mutāfalsifa, the latter having the connotation of pseudo-philosophers. In the very many contexts in which Ibn Taymiyya uses the two terms, in this and other treatises, we cannot observe any difference in their semantic usage. This fact is consistent with Ibn Taymiyya's view that the philosophers are not in possession of real wisdom. Philosophy qua philosophy is erroneous, and those who make it their business to study it are pseudo-scholars, whether called falāsifa or mutafalsifa: there is simply no need to reserve the term falāsifa to any particular connotation, for there are no rightly guided philosophers. (See e.g. Ibn Taymiyya, Tawhīd al-Ulūhiyya, 47; idem, Mufassal al-I'tiqād, 51 (ll. 9-10); idem, Tafsīl al-Ijmāl, 55, 61.) In his article 'Ibn Taymiyya's Critique of Falsafa' (p. 4), T. Michel argues that Ibn Taymiyya usually reserves the term mutafalsifa for al-Suhrawardī and the philosophers of the Ishrāqī school. A wide reading of Ibn Taymiyya's writings does not support such a view.

<sup>&</sup>lt;sup>4</sup> From the beginning of the fourth/tenth century, manuals of Arabic logic opened with an explication of the terms 'concept' (taṣawwur) and 'judgement' (taṣāt̄q), both being organically linked to such other terms as 'definition' (hadd), 'quiddity' (māhiyya), 'essence' (dhāt̄), and 'demonstrative syllogism' (qiyās burhānt). Knowledge, whose acquisition is the main task of logic, obtains in the mind either (1) in the form of individual concepts which connote the essential attribute of a thing, such as the concepts of 'body' and 'soul', or (2) in the form of judgements, such as 'the world is created'. Judgements presuppose the formation of concepts in the mind, for if 'world' and 'created' are not individually apprehended, the mind cannot conceive the judgement 'the world is created'. Concepts and judgements are either primary or acquired; 'a thing' and 'an existent' are, for instance, primary concepts, for they are known without reflection. Unlike, for example, 'soul' and 'angel', which are acquired concepts because their essences (dhawāt) are not subject to immediate apprehension,

- 4. Someone wished to record what I said at that time concerning their logic, and I allowed him to do so because this record would open the door to the knowledge of the truth, although refuting them would require much more than what I have said.
- 5. You ought to know that they have founded logic upon the theory of definition and its species, and upon demonstrative syllogism and its species. They have held that, inasmuch as knowledge is either a concept (tasawwur) or a judgement (tasdīq), the means by which a

'existence' (wujūd) possesses an essence the mind is compelled to apprehend without inference. On the other hand, a primary judgement would be forced upon the mind in the same manner as a primary concept would. That the number two is greater than one, that things which are individually equal to one thing are equal to each other, and that things are either true or false (Law of Excluded Middle) are examples of primary judgement. Sensory matters (hissiyyāt) are also said to belong to this category of judgement. All non-primary judgements are acquired by means of inferences, ranging from syllogism to analogy. Thus while primary concepts and primary judgements are self-evident, and acquired judgements require the use of inference, acquired concepts may be achieved only through definitions (hudūd; sing. hadd):



Both inferences and definitions presuppose knowledge existent in the mind, without this entailing infinite regress since such knowledge must, in the final analysis, rest on certain a priori knowledge lodged in the instinctive intellect (gharīzat al-'aql). Since acquired judgements may presuppose a knowledge of acquired concepts, the latter must be formed by means of definition, namely, a statement (qawl) which informs the mind of the quiddity of a thing. To make a statement of quiddity, the genus (jins) and difference (fasl) must be set forth, for both are of the essence (dhātiyya). The essential, dhātī, is constitutive of quiddity (muqawwim lil-māhiyya), and is not necessarily that which is inseparable from the thing, because there may be non-essential attributes which are also inseparable (lā tufāriq); for example, laughter is an attribute inseparable from humans, but does not constitute, or partake in, their essence. No object (mawdu) may be apprehended without an essence; thus, an essence must first be apprehended for an object to become present in the mind. In order to understand what humanity is, one must apprehend 'animality', for it is an essential attribute without which the concept of humanity can neither exist nor, consequently, be understood. Furthermore, the essence, in a sense, presupposes the object, just as humanity presupposes animality. That is to say, for humanity to exist animality must first exist, but there need not be laughter, for humanity must exist as a prerequisite for laughter. But, most important, the essence is not subject to causal explication: i.e. the question 'What makes a human an animal?' is unanswerable since no agent is said to be involved. If there were one, it would be conceivable that the agent would create a human who was not an animal. Further on the technical signification of these terms see the following: Ibn Sınā, Najāt, 43, 46-7, 69 ff.; idem, al-Hudūd, 10; Ghazālī, Maqāsid, 33-6, 44-6, 66ff.; Kātibī, al-Risāla al-Shamsiyya, with Rāzī's Tahrīr, 7-27, 46ff.; Ijī, Sharh al-Ghurra, 112 ff.; Wolfson, 'The Terms Tasawwur and Tasdiq', 114-28; Jadaane, L'Influence du stoïcisme, 115-17; Black, Logic, 71-8.

concept is formed is a definition, and that by which a judgement is formed is a syllogism. To this we say that the discussion revolves around four points, two negative and two affirmative. The first of the two [negative points] concerns their doctrine that no required concept can be formed except through a definition; and the second of the two that no required judgement can be known except by means of a syllogism. The other two [affirmative points] concern their doctrine that [1] definition leads to the knowledge of concepts, and [2] the prescribed syllogism or demonstration leads to the knowledge of judgements.

## [Chapter 1]

6. FIRST POINT: Concerning their Doctrine that no Concept can be Formed Except by Means of Definition. The refutation of this doctrine includes the following. First, there is no doubt that the onus of proof rests with him who negates, just as it rests with him who affirms. Propositions, negative or affirmative, if not self-evident, necessarily require proof. Negating without possessing knowledge is, in effect, making a statement based on no knowledge. Their statement 'No concepts can be formed except by means of definition' is a negative, not a self-evident proposition. So how did they arrive at this statement? Since this statement is not based on knowledge, and it is the first that they have established, how can it be the basis of the criterion of knowledge and of their claim that logic is a canonical instrument (āla qānūniyya) the correct use of which safeguards the intellect from error?<sup>2</sup>

<sup>2</sup> See Ibn Sīnā, Ishārāt, i. 167 ff. (English trans., 47-8); Tūsī, Sharh al-Ishārāt, i. 167-9; Khabīsī, Sharh, 8-9.

See par. 6, n. 1, below.
 See par. 41, n. 2, below.

See par. 17, n. 1, below.
 See par. 230, n. 1, below.

<sup>6</sup> ¹ Cf. Ibn Sīnā, Najāt, 43: 'The concept... is arrived at by means of a definition or by what may function as one' ('wal-tasawwur... yuktasab bil-hadd wa-mā yajrī majrāh'). In his Ishārāt, i. 184, he explains that 'what may function as a definition' is 'a description and the like' (al-rasm wa-naḥwah). What is meant by 'and the like' is a description which employs accidental rather than essential attributes in forming a concept of a thing. See Tūsī, Sharh al-Ishārāt, i. 184-5; Rāzī, Tahrır, 24 ff. It is only through a definition (hadd), however, that the essence (dhāt) of a matter may be defined. Thus when Ghazālī (Maqāṣid, 34) puts the matter rather briefly he recognizes the essential hadd as the sole means of forming a concept.

- 7. Second, it may be argued that what is intended by 'definition' is the definiendum itself. But this is not what they mean here. By 'definition' they mean the statement indicating the quiddity of the definiendum, for it details what the name indicates in general. We argue that if the definition is the statement of the definer, then the one who defines knows the thing defined either by means of definition or by other means. If the case is the former, then the same can be said of the second definition as was said of the first, and this entails circularity or infinite regress. If it is the latter, then their negative proposition, namely, 'No concept can be formed except through definition', is invalid.
- 8. Third, all the communities of scholars, advocates of religious doctrines, craftsmen, and professionals know the things they need to know, and verify what they encounter in the sciences and the professions without speaking of definitions. We do not find any of the leading scholars discussing these definitions—certainly not the leading scholars of law, grammar, medicine, arithmetic—nor craftsmen, though they do form concepts of the terms used in their fields. Therefore, it is known that there is no need for these definitions in order to form concepts.
- 9. Fourth, until this very day people are not known to have definitions which accord with their principles. Even the most obvious of things, such as the term 'man' and its definition 'a rational animal', are countered with well-known objections. So is the definition of the sun, etc. When the later grammarians preoccupied themselves with

<sup>7 &</sup>lt;sup>1</sup> Ghazālī, Maqāsid, 50; Jurjānī, Ta'rīfāt, 73, s.v. hadd, Aristotle, Analytica Posteriora, 92<sup>b</sup>26-94<sup>a</sup>19; idem, Topica, 101<sup>b</sup>19-102<sup>a</sup>5, 103<sup>b</sup>15. See also par. 3, n. 4, above.

<sup>&</sup>lt;sup>2</sup> The genus and the difference included in the definition presuppose another definition. For example, in the definition of 'human' as 'a rational animal', the terms 'rational' and 'animal' must be defined since they are not considered self-evident. The same applies to the terms used in defining the definition of the definition of 'human', as well as to the definition of these terms ad infinitum, a process ultimately leading to infinite regress. However, if the definiendum was apprehended before apprehending the definition of the terms used in its own definition, then this results in a petitio principii, because while 'humanity' in the example above was apprehended before 'animality', this last is used to apprehend the quiddity of 'humanity'. See Naqd al-Mantiq, 184, where Ibn Taymiyya rephrases the argument.

<sup>9 &</sup>lt;sup>1</sup> The reference here seems to be to discussions such as those of Ibn Sīnā and Naṣīr al-Dīn al-Tūṣī. See *Sharḥ al-Ishārāt*, i. 223-32.

<sup>&</sup>lt;sup>2</sup> On the problematic nature of the definition of the sun see Ghazāli, Maqāsid, 52. As stated by Ghazāli, the definition of the sun as 'the luminous celestial body which appears during daytime' entails circularity, since 'daytime' cannot be apprehended without employing the term 'sun' in its definition; namely, 'daytime is when the sun

definitions, they advanced more than twenty definitions for 'noun', all of which, according to their own principles, are subject to objections.<sup>3</sup> The legal theoreticians advanced more than twenty definitions for the term qiyās, all of which are also subject to objections.<sup>4</sup> Most of the definitions that are recorded in the books of the philosophers, physicians, grammarians, legal theoreticians, and theologians are subject to objections, and only a few of them are sound.<sup>5</sup> If the concepts of things were dependent upon definitions, and if until this day people have not yet formed a concept for any of these matters, and if a judgement is contingent upon conception, so that when a concept is not formed, a judgement is not formed either, then men would have no knowledge of the great majority of their sciences. This [position] is one of the worst sophistries.

10. Fifth, according to them the concept of a quiddity is obtained by real definition (hadd haqīqī) formed of shared and distinguishing essential attributes, namely, that which is composed of genus and difference. Such a definition is either impossible or difficult to come

appears over the earth'. See also Ibn Sīnā, Hudūd, p. 10, par. 17 (French trans., p. 11); Tahānawī, Kashshāf, i. 467 (ll. 23-5), s.v. dawr; Suhrawardī, Hikmat al-Ishrāq, 18-19. In Topica Aristotle remarks that definitions must be made 'through terms that are prior', that is, terms which are presupposed by the term defined. 'Among definitions of this kind are those of a point, a line, and a plane, all of which explain the prior by the posterior; for they say that a point is the limit of a line, a line of plane, a plane of a solid.' Thus, one of the main reasons for the failure of a definition is the use by the definer of the defined term itself: 'This passes unobserved when the actual name of the object is not used, e.g., supposing any one had defined the sun as a "star that appears by day". For in bringing in "day" he brings in the sun' (Topica, 141<sup>a</sup>26; 141<sup>b</sup>19; 142<sup>a</sup>35).

<sup>&</sup>lt;sup>3</sup> See e.g. Ibn Fāris, al-Sāhibī fī Fiqh al-Lugha, 82-5.

<sup>&</sup>lt;sup>4</sup> For an account of such definitions, see Shawkānī, *Irshād al-Fuhūl*, 198; Juwayni, *Burhān*, vol. ii, pars. 681 ff.

<sup>&</sup>lt;sup>5</sup> In this connection see Ibn Sīnā's opening comment to his treatise on definitions al-Hudūd, 1-7, where he acknowledges the serious difficulties involved. See also Ghazāli's discussion in Mi'yār, 281-5, reproduced verbatim in al-Radd, 19-22.

<sup>10 1</sup> A definition may be either complete (tāmm) or incomplete (nāqis). A complete definition consists of all the essential attributes represented in immediate genus and immediate difference (al-jins wal-fasl al-qarībayn); for example, 'man is a rational animal'. An incomplete definition falls short of encompassing the entirety of essential attributes, and is limited to the immediate difference alone or to this difference coupled with the mediate genus (al-jins al-ba'īd); for example, 'man is that which is rational', or 'man is a rational body'. See Kātibī, al-Risāla al-Shamsiyya, 8 (Sprenger translates complete and incomplete definitions as limes perfectus and limes imperfectus, respectively (English text, p. 14)). On real definition as complete definition, see Tūsī, Sharh al-Ishārāt, i. 249 ff.; Ibn Sīnā, Hudūd, 3-4; Khabīsī, Sharh, 31-2; Rāzī, Sharh al-Ghurra, 49-50.

by, as they themselves admit.<sup>2</sup> Hence, it is not always or often possible to form a concept of a particular reality. But since concepts of realities are actually formed, it is known that concepts are not in need of definition.

11. Sixth, according to them, definitions are intended for composed realities (haqā iq murakkaba), which are the species having genus and difference. As to that which is not composed, namely that which is not subsumable together with other [things] under a genus—such as the intellect, which some have given as an example<sup>2</sup>—it has no definition, but none the less they have apprehended it and considered it one of the concepts that are to be sought after (matlūba). It will thus become known that for a concept [to be formed] there is no need for a definition. Indeed, if such a concept is apprehended without definition, then these species have a greater claim to be apprehended, because they are more immediate<sup>3</sup> to the genus, and their individuals are well known. They also argue that judgement does not depend upon complete conception (tasawwur tāmm) obtained through real definition; minimal conception, even in terms of property (khāssa),<sup>4</sup> suffices for judgement. The formation of the concept 'intellect' is of this kind, and this is an admission on their part that the genus of the concept does not depend on real definition.

12. Seventh, he who hears a definition would not apprehend it if he had not already understood the words of the definition and their individual signification. Knowledge that the word signifies a meaning and that it was coined for that meaning presupposes the forming of a concept of that meaning. If the hearer conceives the form and meaning

<sup>&</sup>lt;sup>2</sup> See e.g. Tūsi, Sharh al-Ishārāt, i. 200, and Ibn Sīnā's opening remark in Hudūd, I-2 (French trans., I). On his admission that primary concepts cannot be defined at all, see Davidson, Proofs, 289-90. Suhrawardī seems to attribute this admission to Aristotle himself. See Hikmat al-Ishrāq, 21 (ll. II-I3).

<sup>11 &</sup>lt;sup>1</sup> Cf. Rāzī, al-Mabāhith al-Mashriqiyya, i. 51-6.

<sup>&</sup>lt;sup>2</sup> Aristotle, *Topica*, 139<sup>8</sup>25-32, 154<sup>8</sup>35-154<sup>b</sup>4. But for a philosophical definition of 'intellect' ('aql), see Ghazālī, *Mi'yār*, 286-92; Ibn Sīnā, *Hudūd*, 11 ff.; Āmidī, al-Mubīn, 104 ff. For other terms, see Rāzī, al-Mabāhith al-Mashriqiyya, i. 12 ff.

<sup>&</sup>lt;sup>3</sup> Cf. par. 37, n. 1, below.

<sup>&</sup>lt;sup>4</sup> As, for example, the definition of man as he who laughs, or he who is capable of learning, or he who buys and sells. Although such attributes (khawāss) are not essential (dhātī) to man, but only accidental ('aradī), they are peculiar to man and thus can constitute a definition. Ghazālı considers a definition on the basis of property to be a description (rasm) which functions as a definition (al-rusūm al-jāriya majrā al-hudūd). See Ghazālı, Mi'yār, 106; Fārābī, al-Tawṭ'a fī al-Manṭiq, 61.

of the word prior to hearing the definition, he cannot be said to have formed a concept of the meaning upon hearing that definition.<sup>1</sup>

- 13. Eighth, if the definition is the statement of the definer, then it is known that in order to form concepts of meanings words are not needed, because the one who forms a concept does so without words. The hearer [of this definition] can also form a concept without being told anything at all. So how can it be argued that forming concepts of individual words may not be done except through definition?<sup>1</sup>
- 14. Ninth, one may form concepts of existing things either through one's external senses—such as taste, colour, odour, and bodies which possess such attributes—or through one's inner senses, such as hunger, love, hate, happiness, sadness, pleasure, pain, volition, repugnance, and the like. And none of these is in need of definition.<sup>1</sup>
- 15. Tenth, they argue that the opponent is entitled to challenge a definition by means of Refutation (naqd)—through Coextensiveness (tard) and Coexclusiveness ('aks)<sup>1</sup>—as well as by introducing another,
- 12 ¹ The argument here is as follows. In order to apprehend the definiendum, one must first apprehend the signification of the words which form the definition. But apprehension of the words presupposes an apprehension of the meanings or things to which they refer. If I do not know what bread is, I shall not know what the word 'bread' means. Thus, if the hearer of the definition knows the words which make up the definition and the meanings or objects they signify, then the apprehension of the definiendum does not occur through the definition. For arguing that it does amounts, in effect, to saying that 'the hearer cannot apprehend the meaning until he has heard and apprehended the word, but he will not understand what the word means until he has first understood the meaning'. This is clearly circular. See Ibn Taymiyya, al-Radd, 10.
- 13 <sup>1</sup> The argument here seems to presuppose what has been said in the preceding paragraph. Since words convey meanings that have already been apprehended, then words qua words are not essential in forming a concept of the definiendum, and, therefore, a definition of the definiendum becomes superfluous. It is interesting to note that the argument contained in this paragraph has been reproduced without being abridged, and Ibn Taymiyya says nothing elsewhere to shed further light on it. It is equally interesting to observe that in his Naqd al-Mantiq he omits this argument altogether.
- 14 This is because sensory matters (mahsūsāt) are considered primary concepts (awwaliyyāt) which are necessary (darūriyya), namely, matters which the mind is compelled to comprehend without the medium of inferences. All such matters are thus 'apodictic and true' (muqaddimāt sādiqa wājibat al-qabūl). See Ghazālī, Mi'yār, 186 ff.; idem, Maqāsid, 102-3, 110; Rāzī, Muhassal, 5; Jabre, Essai, 18-19.
- 15 1 Naqd takes place by means of tard and/or 'aks. Tard represents the exact equivalence between the definition and the definiendum; whenever the definition exists the definiendum should likewise exist. Thus, tard does not obtain when the definition is formed in the absence of the definiendum. Nor does it obtain when the definition is not coexclusive (ghayr māni') of attributes which are not amongst the attributes found in the definiendum, such as defining 'man' as 'an animal', since not all animals are men. 'Aks, on the other hand, dictates that when the definition is absent the definiendum

opposing definition (mu'ārada). If the hearer can invalidate the definition at times by Refutation and at others by Opposition, and since neither is possible without first forming a concept of the definiendum, then it becomes clear that the concept of the definiendum can be formed without definition. And this is what we sought to prove.

16. Eleventh, they admit that some concepts are self-evident and in need of no definition. We maintain that knowledge, whether self-evident or acquired, is a relative, relational matter. What may be axiomatic for one man may be acquired for another, since the former may arrive at it by witnessing it himself or by means of multiply transmitted reports  $(taw\bar{a}tur)^2$  or contextual evidence  $(qar\bar{a}'in)$ . People differ in their faculties of perception in a way that cannot be standardized. What is self-evident for someone may, without the need for definition, also become axiomatic for another through means similar to those to which the former was exposed.

must be absent too, since the former ought to be exhaustive (jāmi') of all the essential attributes found in the definiendum. Should the definition not be exhaustive, it would cease to exist, and only part (some attributes) of the definiendum would remain in existence. For example, if 'human' is defined as 'an Indian', the definition is not coexclusive, since 'human' remains in existence after all Indians have been excluded. A sound definition must be coexclusive (māni'). See Ibn Taymiyya, al-Radd, 11-12; Tahānawī, Kashshāf, i. 905-6, s.v. Ittirād. Further on the dichotomy of jāmi' and māni', see Brunschvig, 'Gāmi' Māni'', 355-7.

16 1 See par. 3, n. 4, above.

<sup>2</sup> Multiple reports (mutawātirāt) are transmitted by a large number of people at each stage of transmission, beginning with the original event itself. The number of transmitters of any one piece of information is large enough to preclude the possibility of transmitters colluding on a lie or a forgery. Only after certainty has been attained does one know that a particular report was a mutawātir. See Ibn Sīnā, Ishārāt, i. 398 (English trans., 121); Rāzī, Lubāb al-Ishārāt, 27 (ll. 2-5); Āmidī, Mubīn, 79. For a detailed account and analysis, see my 'Inductive Corroboration', section iii, and Weiss, 'Knowledge of the Past', 86 ff.

<sup>3</sup> Although qarā'in are said to represent circumstantial and contextual knowledge extraneous to the propositions being conveyed, they enhance the basic knowledge posited in these propositions. Being so extraneous, they are present in the mind of individuals to varying degrees. A person who has rounded knowledge of both the transmitters and the circumstances under which they have narrated a particular prophetic tradition will be in a better position to believe or disbelieve the veracity of such tradition than another who lacks such circumstantial and contextual knowledge.

Further on qara'in see my 'Notes on the Term qarīna', 475-80.

<sup>4</sup> This argument rejects the philosophers' assumption that some knowledge must be self-evident, since infinite regress would be involved should all knowledge be acquired. The body of self-evident knowledge differs from one mind to another, for one person may have sensory knowledge of a particular matter (and thus he will be in possession of self-evident knowledge) while another may not. Since self-evident knowledge enters the mind without inference, and thus without definition, it is possible to increase the amount of knowledge in the mind without resorting to definition.

## Chapter [2]

17. SECOND POINT: [Concerning their Doctrine that] Definition Leads to the Conception of Things. We say: the verifiers amongst the thinkers (nuzzār) know that the function of a definition is to distinguish between the definiendum and other things, just like a name, whose function is not to give a concept of the definiendum, nor to delimit its reality. The claim that definitions lead to forming a concept of things is that of the Greek logicians, the followers of Aristotle, as well as of those Muslims and others who have followed their path by imitating them. However, the majority of Muslim thinkers, theologians, and others hold a different view.

18. Those who introduced this [essential definition] are the ones who wrote on the principles of religion and law after Abū Ḥamid [al-Ghazālī]—towards the end of the fifth century—and it is they who have discoursed on definitions according to the doctrine of the Greek logicians. Scholars of all other denominations—the Ash'arīs, Mu'tazilīs, Karrāmīs,¹ Shī'is, and others—hold that the function of definition is to distinguish between the definiendum and other things. This is well known in the writings of Abū al-Ḥasan al-Ash'arī,² al-Qādī Abū Bakr [al-Bāqillāmī],³ Abū Ishāq [al-Isfarā'īnī],⁴ Ibn Fūrak,⁵

<sup>17 1</sup> Ibn Sīnā, Najāt, 43; Rāzī, Taḥrīr, 25 ff.; Ghazālī, Maqāṣid, 34; Ijī, Sharh al-Ghurra, 148.

<sup>&</sup>lt;sup>2</sup> Verifiers (muhaqqiqūn) are scholars who establish the solution of problems by means of original proofs and reasoning. See Tahānawī, Kashshāf, i. 336, s.v. tahqīq.

<sup>&</sup>lt;sup>3</sup> Literally, the word *nuzzār* means 'speculative thinkers'. However, we translate the term as 'thinkers' whenever Ibn Taymiyya employs it to refer to scholars approvingly. For him, obviously, speculation is an abhorrent practice and he ordinarily associates it with his foes, the rationalist speculative theologians (*al-mutakallimūn*).

<sup>18 &</sup>lt;sup>1</sup> The Karrāmīs are the followers of Abū 'Abd Allāh Muhammad b. Karrām (d. 255/869). This sect was seen by mainstream Sunnism as being literalist and anthropomorphist. See *Encyclopaedia of Islam*<sup>2</sup>, iv. 667-9, s.v. 'Karrāmiyya' (by C. E. Bosworth); Ibn al-Murtadā, *al-Munya*, 111-12; Watt, *Formative Period*, 290-1; Shahrastānī, *Milal*, 79 ff.

<sup>&</sup>lt;sup>2</sup> Died in 324/935. For a biographical account see Subkī, *Tabaqāt*, ii. 245-301. See also Sezgin, *Geschichte*, i. 602 ff.; Laoust, *Les Schismes*, 128-9.

<sup>&</sup>lt;sup>3</sup> Died in 403/1013. See Encyclopaedia of Islam<sup>2</sup>, i. 958-9, s.v. 'al-Bāķillānī' (by R. J. McCarthy); Sezgin, Geschichte, i. 608-10.

<sup>&</sup>lt;sup>4</sup> Abū Ishāq Ibrāhīm b. Muhammad b. Ibrāhīm al-Isfarā'īnī (d. 418/1027), an Ash'arī theologian and a Shāfi'ī lawyer. See his biography in Subkī, *Tabaqāt*, iii. 111-14; *Encyclopaedia of Islam*<sup>2</sup>, vi. 107-8, s.v. 'al-Isfarāyinī' (by W. Madelung).

<sup>&</sup>lt;sup>5</sup> Abū Bakr Muhammad b. al-Hasan Ibn Fūrak al-Anṣārī (d. 406/1015), an Ash'arī theologian and a Shāfi'ī lawyer. For a biographical account see Subkī, *Tabaqāt*, iii. 52-6; Sezgin, *Geschichte*, i. 610-11; *Encyclopaedia of Islam*<sup>2</sup>, iii. 766-7, s.v. 'Ibn Fūrak' (by W. M. Watt).

al-Qādi Abū Ya'lā,6 Ibn 'Aqīl,7 Imām al-Haramayn,8 Nasafī,9 Abū 'Alī [al-Jubbā'ı], 10 Abū Hāshim [al-Jubbā'ī], 11 'Abd al-Jabbār, 12 al-Tūsī, 13 Muhammad b. al-Haysam, 14 and others. 15

19. Furthermore, there is no doubt that what the logicians held concerning the theory of definition (sinā'at al-hadd) is of their own invention. Prior to them nations knew the realities of things without such an invention, and so did most nations after them. If the logicians think deeply, they too will find themselves grasping the realities of things without [resorting to] this invented discipline. They also claim that their theory leads to delimiting the realities of things, and that without it things cannot be apprehended. Both of these claims are

Abû al-Wafa' 'Alī b. Muhammad Ibn 'Aqīl b. Ahmad al-Baghdādī was a Hanbalī jurist and theologian (d. 513/1119). See Ibn Rajab, Dhayl, i. 142-65; Encyclopaedia of Islam<sup>2</sup>, iii. 699-700, s.v. 'Ibn 'Akil' (by G. Makdisi).

8 Imām al-Haramayn Abū al-Ma'ālī 'Abd al-Malik al-Juwaynī died in 478/1085. See his biographical account in Subkī, Tabaqāt, iii. 249-83; Encyclopaedia of Islam², ii. 605-6, s.v. 'Djuwaynī' (by C. Brockelmann—(L. Gardet)).

Abû al-Mu'in al-Maymûn b. Muhammad al-Nasafî, a Hanafî jurist and theologian (d. 508/1114). See Brockelmann, Geschichte, suppl. i. 757; Shorter Encyclopaedia of

Islam, 438-9, s.v. 'al-Nasafī' (by A. J. Wensinck).

10 Abū 'Alī Muḥammad b. 'Abd al-Wahhāb al-Jubbā'ī, a leading Mu'tazilī theologian (d. 303/915). See his biography in Ibn al-Murtadā, al-Munya, 170-4; Ibn al-Nadīm, Fihrist (Takmilat al-Fihrist, 6); Encyclopaedia of Islam<sup>2</sup>, ii. 569-70, s.v. 'al-Djubbā'ī' (by L. Gardet).

11 Abû Hāshim Muḥammad b. 'Abd al-Wahhāb al-Jubbā'ī, the son of Abû 'Alī (see preceding note). He succeeded his father in leading the Mu'tazila, and died in 321/933. See his biography in Ibn al-Murtadā, al-Munya, 181-2; Ibn al-Nadīm, Fihrist, 247; Encyclopaedia of Islam<sup>2</sup>, ii. 570, s.v. 'al-Djubbā'ī' (by L. Gardet).

12 Abû al-Hasan Qādī al-Qudāt 'Abd al-Jabbār b. Ahmad al-Hamadhānī al-Asadabādı, a leading Mu'tazilı theologian and a follower of the Shāfi'ī school of law (d. 415/1024 or 416/1025). See his biography in Ibn al-Murtadā, al-Munya, 194-5; Encyclopaedia of Islam<sup>2</sup>, i. 59-60, s.v. "Abd al-Djabbār' (by M. Stern).

13 It is highly probable that this Tusī is Muḥammad b. al-Ḥasan Abū Ja'far al-Tūsī, a

Shī'ī jurist and theologian (d. 458/1065 or 460/1067). See al-Najāshī, Rijāl, 403 (no. 1068); Encyclopaedia of Islam, iv/2, 982, s.v. 'Al-Tūsī, Muhammad' (by H. Hosain).

Aside from being a Karrāmī theologian who seems to have systematically elaborated the theology of his sect, very little is known of this scholar. See Shahrastānī, Milal, 80 ff.; Encyclopaedia of Islam<sup>2</sup>, iv. 668, s.v. 'Karrāmiyya' (by C. E. Bosworth).

15 In his al-Radd, 15, he further includes a certain Mūsawı (probably Hibat Allah Muhammad al-Mūsawī; Sezgin, Geschichte, i. 534-5) as well as Ibn al-Nawbakht, who must be Abū Muhammad al-Hasan b. Mūsā al-Nawbakhtī, an Imāmī Shī'ī theologian, philosopher, and astronomer who flourished around 300/912. See Sezgin, Geschichte, i. 539-40, and par. 282, n. 4, below. (It seems unlikely that the reference is to Abū Sahl al-Nawbakhti, who is also known as Ibn al-Nawbakht. See Encyclopaedia Iranica, i. 372-3, s.v. 'Abū Sahl Nawbaktı' (by W. Madelung).) Without mentioning names, Ibn Taymiyya also includes other leaders of the Mu'tazili and Karrāmī schools.

<sup>&</sup>lt;sup>6</sup> Muhammad b. Husayn b. Muhammad b. Khalaf Ahmad Abū Ya'lā Ibn al-Farrā', a renowned Hanbalī jurist and theologian (d. 458/1066). See Farrā', Tabaqāt, ii. 193-230; Encyclopaedia of Islam<sup>2</sup>, iii. 765-6, s.v. 'Ibn al-Farrā'' (by H. Laoust).

wrong. But having held this view, they have found it necessary to distinguish some attributes from others, because they have deemed that forming a concept (tasawwur) is possible through what they consider to be essential (dhātī). Accordingly, it is necessary for them to distinguish between what in their opinion is essential and what is not. This has led them to draw a distinction between identical things, whereby they deem one attribute, to the exclusion of the other, to be of the essence, although both attributes are equal and akin to each other: drawing a distinction between identical things is impossible, and between things akin to each other difficult. Thus, what is sought is either impossible or difficult. If it is impossible, then it is entirely invalidated; but if it is difficult, it will result in no knowledge that is not already known. It is therefore either impossible for them [to form concepts] in accordance with what they have stipulated, or it is possible but without attaining what they have sought. In either case, the definition they have invented does not constitute a means for forming concepts of the realities in the mind of a person who cannot conceive realities without definition, although it may be useful for distinguishing the definiendum in the same way names are useful for such a distinction.

20. In his *Muhassal* and other works, al-Fakhr al-Rāzī understood the theologians' position and asserted that concepts cannot be acquired. This is essentially our view: definition cannot lead to forming a concept of the definiendum. This is an important point that should be understood. It is because this point was neglected that corruption seeped into the intellects and religion of many people. For they mixed what the logicians maintained about definitions with the prophetic sciences which the messengers of the Muslims, Jews, and Christians had introduced. They also mixed it with other sciences, such as medicine, grammar, etc., and exaggerated its importance. They claimed that they themselves were the ones who had verified definitions, and that the definitions which others held were merely verbal, and that, unlike their own definitions, the definitions of

<sup>20 &</sup>lt;sup>1</sup> Fakhr al-Dīn al-Rāzī (d. 606/1209) was a leading Ash'arī theologian and lawyer, and a commentator on Ibn Sīnā's *Ishārāt*. For a biographical notice, see Subkī, *Tabaqāt*, v. 33 ff. In his *Muhassal*, 3-5, Rāzī in fact makes the qualified statement that *some* concepts cannot be acquired. He gives two reasons for his view, the first of which, interestingly, is identical to Ibn Taymiyya's argument advanced in par. 31. In Rāzī's view the acquisition of concepts is limited to external and inner senses as well as to intuition.

<sup>&</sup>lt;sup>2</sup> For 'verification', see par. 17, n. 2, above.

others did not lead to the delimitation of quiddity and reality.<sup>3</sup> They follow arduous and lengthy methods and employ artificial and dreadful expressions. In these methods they derive no benefit but only waste their time, exhaust their minds, and fall into a state of much delirium; they claim to ascertain the truth but lie and deceive, and engage the soul in what is useless so that it will be distracted from that which is necessary. Their methods enhance ignorance, which is the source of hypocrisy in the heart, though they claim it to be the source of knowledge and truth. This is the sort of discussion the forefathers prohibited, although what the latter prohibited is superior to the logicians' discourse because those discussions addressed indicants and judgements.<sup>4</sup>

- 21. The early theologians were not willing to tackle definitions according to the method of the logicians, as did the later theologians who thought this method to be sound, when it is, in fact, erroneous. Since such definitions do not impart knowledge not already possessed, but represent idle talk, the theologians were called 'the people of talk' (ahl al-kalām). This, by my life, pertains to definitions that contain no falsehood. As for the logicians' definitions, by which they claim they can form concepts of realities, they are false; through these definitions they bring together disparate things and distinguish between those that are identical.
- 22. The proof that definitions are of no use for forming concepts of realities consists of the following. First, a definition is merely a statement and claim of the definer. For example, the statement 'The definition of "man" is a "rational animal" is a declarative proposition (qadiyya khabariyya) and a mere claim devoid of proof. The hearer may or may not know the truthfulness of this proposition before hearing it. If the former is the case, this is proof that he did not acquire this knowledge through the definition. If it is the latter, the mere statement of the informant, without proof, does not yield

<sup>3</sup> The non-logicians' definitions, that is, are dictionary definitions which give the lexical meanings of concepts. Further on lexical definitions, see Robinson, *Definition*, 35 ff.

<sup>35</sup> ff.

4 Ibn Taymiyya must be referring to the traditionists' censure of ahl al-ra'y, who were seen as advocates of rational and speculative methods in the sphere of legal reasoning. 'Indicants and judgements' refer to textual (i.e. Quranic and Sunnaic) indicants and legal judgements based on these indicants. On indicants and judgements see Bājī, Hudūd, 37-41, 72; and see par. 42, n. 2, below.

<sup>22 &</sup>lt;sup>1</sup> A declarative proposition is a statement capable of being judged as either true or false. See under *khabar* in Tahānawī, *Kashshāf*, i. 410-11, and Jurjānī, *Ta'rīfāt*, 85.

knowledge. How could it yield knowledge when the hearer knows that the informant is not infallible in what he says? In either case, it becomes clear that the definition does not lead to the knowledge of the definiendum.

- 23. Someone may argue: 'A definition leads merely to forming a concept of the nominatum without determining, for instance, whether that definition corresponds to the nominatum or to something else.' We reply: the definition would then merely be like a single expression signifying a meaning, which is tantamount to a name signifying its nominatum. This fact proves what we have said, namely, that the signification of a definition is like the signification of a name. Unquestionably, the name alone does not lead to forming a concept of the nominatum in the minds of those who could not form a concept of it without such a name; the same applies to definition.
- 24. Second, they argue that a definition is neither coexclusive  $(m\bar{a}ni^*)^1$  nor subject to proof, but can be invalidated by Refutation and Opposition. We say: if the definer does not adduce proof for the validity of a definition, the hearer will not apprehend the definiendum if he thinks it possible that the definer may be mistaken. If the hearer does not know the validity of the definition through the definer's statement, which may be true or false, then it is impossible for the hearer to apprehend the definiendum through the statement of the definer.
- 25. It is astonishing that the logicians claim these methods to be rational and certain, and that they should consider the knowledge of the simple (*mufrad*) to be the source of the knowledge of the composite (*murakkab*), and the mainstay of this doctrine to be definition,

<sup>24</sup> When the definition is not coexclusive (ghayr māni'), there will be included in it attributes that do not belong to the genus and the difference of the definiendum. See par. 15, n. 1, above.

<sup>&</sup>lt;sup>2</sup> See par. 15, n. 1, above.

<sup>25 &</sup>lt;sup>1</sup> According to the philosophers a composite concept signifies a meaning the parts of which may be expressed through parts of that concept. 'Man is an animal', for instance, is a composite concept containing the two parts 'man' and 'animal', each signifying a more specific meaning than the totality of the meaning expressed in 'man is an animal'. Simple concepts, on the other hand, are not divisible and thus contain no parts that express a more limited meaning than the whole of the concept. In the simple concept 'man', the part 'ma', for example, has no meaning whatsoever since the term 'man' is indivisible. The simple concept is not to be confused with the particular or the individual (al-wāhid), for it may apply to both mental and extramental existents, including the entire genus. The individual applies only to the extramental, namely, to a real, particular member of a class. In contradistinction to 'Jacob', an individual, 'a human' is simple. See Ibn Sīnā, Shifā': Madkhal, 24 ff.; Jurjānī, Ta'rīfāt, 199; Āmidī, Mubīn, 48-9.

which is a statement of the definer without proof. Such a statement is a solitary report (khabar wāhid)<sup>2</sup> about a rational, not a sensory,<sup>3</sup> matter; it is subject to correctness and error, truth and falsehood. At the same time they fault those who in revealed matters rely on a solitary report which, when accompanied by contextual evidence (qarā'in), leads the hearer who apprehends it to certain knowledge.4 But they claim that a solitary report does not lead to certain knowledge. If this is so, then their argument in favour of definition is like a solitary report for the truthfulness of which there exists no proof. Indeed, according to them, it is impossible to construct proof for its truth. Therefore, definition does not lead to forming a concept of the definiendum. But if without a definition the hearer does form a concept of the definiendum, whether before, simultaneously with, or subsequent to hearing the report, and if he comes to know that this is its definition, only then will he know the truthfulness of that definition. In this case, it is clear that it was not the definition which led to forming the concept. In short, forming a concept of the definiendum by means of definition is impossible without knowing the truthfulness of the definer's statement. But the truthfulness of his statement cannot be known merely by uttering the definition. Hence, the definiendum cannot be known through definition.

26. Third, we maintain that if a definition gives a concept of the definiendum, the concept will not be formed until the validity of the definition is established, because the definition is the evidence of the concept and the means by which it is formed and brought to light. It is impossible to apprehend the definiendum before apprehending the validity of that which defines it. But the validity of a definition is apprehended only after the definiendum has been apprehended, because the definition is a report about something reported, namely, the definiendum. It is thus impossible to know the validity and truthfulness of the report prior to forming a concept of the very thing

<sup>&</sup>lt;sup>2</sup> A solitary report (khabar wāhid or khabar āhād) is a statement transmitted through channels fewer than those of a mutawātir, and is thus said to lead to probable knowledge. See Jurjānī, Ta'rīfāt, 85-6, s.v. khabar; Ibn al-Hājib, Muntahā al-Wusūl, 51-2. For mutawātir reports, see par. 16, n. 2, above.

<sup>&</sup>lt;sup>3</sup> For a report to be certain the information it conveys must be based on sense perception. When lacking sensory foundation, the probability of the report significantly increases, as knowledge based on sense perception is taken to be self-evident. See Weiss, 'Knowledge of the Past', 88; Hallaq, 'Inductive Corroboration', 9 ff.

<sup>4</sup> When strong against the property of the propert

<sup>&</sup>lt;sup>4</sup> When strong qarā'in surround the transmission of solitary reports (āhād) they are said to corroborate these reports to such a degree that their transmission acquires the status of tawātur. See par. 16, n. 3, above. On the corroborative force of qarā'in see Hallaq, 'Inductive Corroboration', 9ff.; idem, 'Notes on the Term qarīna', 478-9.

reported, independently (min ghayr taqlīd)<sup>1</sup> of the reporter and without [blindly] adopting his own apprehension of the thing reported; for the latter does not fall under the category of reporting about invisible matters.<sup>2</sup>

27. Fourth, the logicians define the definiendum by means of attributes they call essential and accidental. They also call these attributes—using these as well as similar designations—the parts  $(ajz\bar{a}')$  of definition and the parts of quiddity, parts which are constitutive of quiddity (muqawwima lil-māhiyya) and are included in it.<sup>1</sup> If the hearer does not know that the definiendum possesses these attributes, he will not be able to form a concept of it; but if he does know, he will form a concept of it without definition. Therefore, we have proved that in either case the hearer does not form a concept of the definiendum by means of definition. This is obvious, for if it is said: 'Man is a rational animal' and the hearer does not know what 'man' is, he will need to know the relationship [between 'man' and 'rational animal']. If he does not form a concept of the object of 'rational animal', he will need two things: to form a concept of this object and to know the aforementioned relationship. If he knows both, he will form a concept of 'man' without a definition. Admittedly,

<sup>26 &</sup>lt;sup>1</sup> Cf. pars. 1, n. 1, above, and 36, n. 2, below.

<sup>&</sup>lt;sup>2</sup> It will become obvious that for Ibn Taymiyya the senses are the only material source of human knowledge, save, of course, for revealed knowledge (see Ibn Taymiyya, *Muwāfaqat Sahīh al-Manqūl*, i. 104). Since definitions must deal with the former category of knowledge, the acceptance of a definition cannot be taken from the definer as a matter of faith, and thus the validity of the definition must presuppose a genuine apprehension of the definiendum. This, Ibn Taymiyya wishes to say, surely renders the definition superfluous.

<sup>1</sup> Predicables may be either essential or accidental. The accidental is in turn divisible into necessary and inseparable (lāzim ghayr mufāriq) on the one hand, and separable (mufaria) on the other. An essential predicable is that which constitutes its own subject without which the quiddity of the subject cannot exist; 'figure', for example, is constitutive of the quiddity of 'triangle', for in order to form a concept of a 'triangle' the notion of 'figure' must be present. The necessary accidental, on the other hand, is concomitant with the quiddity but does not constitute a part of it. 'Laughter', for instance, does not constitute an essential attribute of 'humans', although it is permanently concomitant with humanity. Although the necessary accidental is not constitutive of quiddity, Ibn Sīnā argues that such an accidental is immediately apprehended by the mind, and if it is not, it will be so known by means of a middle. However, separable accidental attributes, such as the poverty of Jacob or the sitting position of Abraham, are not permanent. See Introduction, Part I, Section 2, above; Ibn Sīnā, Ishārāt (with Tūsī's commentary), i. 199-213 (English trans., 53-4); Ghazālī, Maqāsid, 44-8; Aristotle, Topica, 110<sup>b</sup>21 ff. See also the quotation from Ibn Sīnā in par. 32, n. 1, below.

the definition may point out the concept of the definiendum, just as the name does. For the intellect may be unheedful of an object, but when it hears its name and definition, it attends to the object that was pointed out through the name and definition, thus forming a concept of that object. The usefulness of a definition would then be like that of a name. The definitions of species by means of attributes would be like the definitions of objects by means of specifying directions, as when it is said that the boundary of a parcel of land from the south is such-and-such, and from the east side such-andsuch; the land is then distinguished by its title and definition, the latter being needed if one fears that there might be an addition to or subtraction from it.<sup>2</sup> The definition would then encompass the entirety of the definiendum, and exclude what does not belong to it, just like the name. So would the delimitation of species, which at times obtains by means of verbal definitions, and at others by definitions stipulated by convention. The purpose of a definition in either case is to clarify only the nominatum as well as to draw a distinction between the definiendum and other things, but not to form a concept of the definiendum. Since the utility of the definition lies in the clarification of the nominatum, and since naming is a matter of language and convention, what is to be considered then is the intention and language of the one who names.<sup>3</sup> Accordingly, the jurists hold that the definitions of some names are known by means of religious law, and others by custom ('urf).

28. Related to this matter is the interpretation and explanation of speech. If by 'interpretation and explanation' is meant explicating the intention of the speaker, then such explication must be based upon knowledge of the definitions of his words. But if the validation and verification of the speech is meant, then proof in favour of such validity must be adduced. The former involves the explication of

<sup>&</sup>lt;sup>2</sup> See an almost identical statement about the use of definition in Maqdist, al-Bad' wal-Ta'rikh, i. 29.

<sup>&</sup>lt;sup>3</sup> See Introduction, Part I, Section 2, above.

<sup>28</sup> ¹ 'Interpretation and explanation of speech' (tafsīr al-kalām wa-sharhih) seems to refer to the logicians' al-qawl al-shārih, a statement explicating the definition (hadd) or the description (rasm) of a thing so that a concept of it may be formed. Ibn Sinā, Ishārāt, i. 184 (English trans., 49); Rāzı, Tahrīr, 25; Ghazālī, Mi'yār, 68. Ibn Taymiyya's argument here again rests on his assumption that the definition, as well as the description, does not necessarily reveal the quiddity of the definiendum.

<sup>&</sup>lt;sup>2</sup> That is, when 'interpretation and clarification' is taken to mean the need to explicate the intention of the speaker.

how a concept of his speech was formed, while the latter addresses the validity of inferences by means of which his statements were derived. Forming a concept of his speech is like forming a concept of the nominatum by means of epitome (tarjama), either for those who have already formed a concept of the object of the name but do not know that such is its name, or for those who have not yet formed a concept of the nominatum. Thus, the very nominatum, or its equivalent, is pointed out accordingly. It is on these grounds that it is said that the definition belongs at times to the name, and at others to the nominatum.

29. The leading authors on the subject of definitions according to the logicians' method admit this in their investigations, as did al-Ghazāli in al-Mi'yār,<sup>2</sup> the treatise he wrote on logic. Ibn Sinā,<sup>3</sup> Rāzī, 4 Suhrawardı, 5 and others also held this; namely, that definitions have the same kinds of uses as names, and that it is the same as substituting one word for another. 6 Belonging to this issue is the

In al-Radd (43-7), Ibn Taymiyya quotes Ibn Sīnā's Shifā': Ilāhiyyāt, i. 29-31, 104-6.

Presumably Fakhr al-Dīn al-Rāzī. See par. 20, n. 1, above.

Abū al-Fath Shihāb al-Dīn Yahyā b. Habāsh b. Amīrak al-Suhrawardī al-Maqtūl al-Halabī (d. 587/1191). See Brockelmann, Geschichte, i. 437-8; Encyclopaedia of Islam, iv/1, 506-7, s.v. 'al-Suhrawardı' (by S. van den Bergh).

In his al-Radd, 40-2, Ibn Taymiyya quotes from Ghazālı and Fārābī a number of passages to show that they held the view that names serve to distinguish the nominatum from other things, not to form a concept of its quiddity. But when these passages are viewed in the larger context of Ghazāli's and Fārābi's theories, it becomes obvious that

<sup>29</sup> Namely, that definitions (hudūd) and names (asmā') have the same defining functions. See n. 6 below.

In support of his argument Ibn Taymiyya quotes in his al-Radd (40-1) relevant passages from Ghazālī's Mi'yār, 48.

<sup>&</sup>lt;sup>6</sup> In point of fact Ghazālī does not completely equate definitions with names, at least not in Mi'yār al-'Ilm, where Ibn Taymiyya says he does. There (pp. 266-7) Ghazālī explains that a definition specifying the genus and difference results in a knowledge of quiddity in an explicit and concise manner ('ilman mulakhkhasan mufassalan), whereas a name yields only a general, indeterminate knowledge ('ilman jumliyyan). The difference between 'wine' (a name) and 'an intoxicating beverage extracted from grapes' (a definition) illustrates the point. Similarly, Ibn Sīnā does not seem to equate the definition with the name; in his Najāt, 114-15, he maintains that a definition explicates the quiddity of the name (qawlun yashrahu al-ism). However, in his Sharh al-Ishārāt, i. 249, Tūsī asserts that some definitions amount to names, while others, which are the chief preoccupation of logic, explicate quiddity. Thus, according to the most liberal interpretation of Ibn Sīnā, only some definitions may be said to yield the same knowledge as that derived from names, and vice versa. In his Lubāb al-Ishārāt, Rāzī makes no comment to this effect. Ibn Taymiyya's attribution of this view seems accurate only in the case of Suhrawardī, who discusses this issue in Hikmat al-Ishrāq, 19-20.

discussion of the obscure verses of the Quran, prophetic reports, etc.; in fact, the exegesis of the Quran and the interpretation of other types of discourse belong in their initial stages to this category. For the aim is to reveal what the speaker intended by these names and this discourse. The logicians agree that such a definition is linguistic, although it is the very thing needed in teaching works of scholarship, and indeed in studying all books as well as in all sorts of discourse. He who reads treatises on philology, medicine, or other subjects must know what their authors meant by these names and what they meant by their composite discourse; so must he who reads books on law, theology, philosophy, and other subjects.

30. The knowledge of these definitions is derived from religion, for every word is found in the Book of God, the Exalted, as well as in the Sunna of His Messenger, may God bless him. Knowing them is a duty incumbent either upon all Muslims (fard 'ayn) or upon those of them who can fulfil it (fard kifāya). Accordingly, God rebuked those who did not know these definitions (hudūd) when He said: 'The Bedouins are more stubborn in disbelief and hypocrisy, and more likely to be ignorant of the delimitations (hudūd)¹ which God has revealed to His Messenger.'² In what God revealed to His Messenger there are names which may be unfamiliar to the hearer, such as the words dīzā, qaswara, 'as'asa,³ and the like, and other names which may be common, though their definitions are unknown

Ibn Taymiyya's argument on the basis of these particular citations is somewhat strained. Ibn Taymiyya could have chosen more instructive statements to make his point. Fārābī, for instance, does maintain in his Īsāghūjī that when a certain meaning has a name as well as a definition, they both serve in defining the quiddity of the nominatum or the definiendum. The difference between them, however, is that 'the name defines the meaning of the thing and its quiddity in a general, not a specific and succinct manner. The definition defines its meaning and quiddity in a specific and succinct manner on the basis of the things of which it is constituted (bi-hā qiwāmuh)' (Fārābī, Īsāghūjī, 87).

<sup>30 &</sup>lt;sup>1</sup> Definitions and delimitations (both expressed as hudūd in Arabic) refer to the limits set for a particular concept or thing. Thus the limit of a term is the boundary which confines a particular connotation and meaning to a term, so that no addition to, or omission from, that meaning may take place. Likewise, God's limits (or delimitations) are those legal stipulations (= punishments) to be strictly observed and applied. See Baydāwi, Anwār, 265.

<sup>&</sup>lt;sup>2</sup> Quran, 9: 99.

<sup>&</sup>lt;sup>3</sup> Dīzā, qaswara, and 'as'asa occur in Quran 53: 23, 74: 51, and 81: 17, respectively. Dīzā means 'injustice'; qaswara means 'lion'; and 'as'asa, being one of the addād (words that mean a thing and its antonym), indicates the beginning or end of night-time (iqbāl aw idbār al-layl). Further on their meanings in exegesis, see, in the same order, Baydāwī, Anwār, 698, 771, 786.

and their meanings known only in a general way—e.g. salāt, zakāt, siyām, and hajj. Thus, it is clear that the definition of a thing occurs through defining the thing itself or defining something which is similar to it; for if someone apprehends the thing itself he will not need a definition in order to apprehend it. But if he does not apprehend the thing itself, he will arrive at knowledge of it once he apprehends a thing similar to it, albeit similar only in certain respects. Out of these similarities and commonalities, he will assign to the definiendum its own particular attributes. He who closely examines this matter will see its truth, and will believe what mankind was told about the invisible world—e.g. the angels, the Day of Judgement, and the kinds of happiness and suffering found, respectively, in Paradise and Hell. Their theory of definition is thus invalidated.

31. Fifth, simple concepts cannot be sought after, and thus they cannot be known by means of a definition, because if the intellect were aware of them, it would not seek them<sup>2</sup>—since obtaining what has already been obtained is impossible. But if the intellect is not aware of them, it is impossible for one to seek what one is not aware of, since the act of seeking and enquiring presupposes awareness. If it is said that man does seek to form concepts of angels, demons,

<sup>&</sup>lt;sup>4</sup> In legal jargon salāt means 'prayer'; zakāt 'alms-tax'; siyām or sawm 'fasting'; and hajj 'pilgrimage'. For the basic as well as technical connotations of these terms see Jurjānī, Ta'rīfāt, 117, s.v. salāt; 101, s.v. zakāt; 119, s.v. sawm; and 72, s.v. hajj. See also al-Mūsilī, al-Ikhtiyār, i. 37 ff., 99 ff., 125 ff., 139 ff.

<sup>31</sup> An argument identical to the one that follows may be found in Rāzī, Muḥaṣṣal, 4 (ll. 1-4). It is adduced in connection with his view that not all concepts can be acquired. See par. 20, n. 1, above. For Tūsi's critique of the argument, see Tusī, Talkhīs al-Muhassal, 4 (ll. 16-20).

<sup>&</sup>lt;sup>2</sup> That is, if the intellect is in no way aware of them it will not feel the need to form such concepts. What Ibn Taymiyya seems to be saying is that seeking to form concepts presupposes some sort of rudimentary knowledge of things, and that when such concepts are sought it is in order to develop, confirm, or reaffirm an already existing awareness. If our understanding of Ibn Taymiyya is correct, then the consequence of his view would pose the problem that the acquisition of knowledge is severely restricted, that arriving at new knowledge is practically impossible. The rest of the paragraph, however, seems to provide an attempt to answer this problem. When we hear a new word the meaning of which we do not know, we become aware of something, that is, the word itself, a fact which prompts us to enquire about its meaning as well as about the thing to which it refers. If we have never heard the term 'snow', or have not seen snow before, we have no reason to enquire about it. But having now heard the term, we are given a definition of it. This involves us in the very process of definition which Ibn Taymiyya does not think to be fruitful. What Ibn Taymiyya must be saying, then, is that definition alone, without seeing the snow itself, is insufficient for forming a concept of snow. But if we see snow, and we are told 'this is snow', then the definition becomes superfluous. See also al-Radd, 61-2.

souls, and numerous other things, though he is not aware of them, we answer that man has heard these names and thus seeks to form a concept of their objects, just as someone would seek to form a concept of words he has heard but the meaning of which he does not know. If he could form a concept of the objects of these names, he would necessarily know that the objects do have such names, for if he were able to form a concept of a reality for which a particular name did not exist, he would not be forming a concept of that of which he sought to form a concept. The object of the concept here is an essence given a certain name. The concept formed is not only of the meaning but also of the name assigned to that meaning. Undoubtedly, such a concept is sought after, although it is not necessary that the individual meaning be sought. Furthermore, what is sought after here cannot be obtained merely by means of a definition; rather, it is necessary to delimit the object of definition by pointing it out or by other means when words alone are not sufficient. Since the impossibility of seeking individual concepts has been proven, these concepts may either be known to people without being obtained by means of definition—in which case the definition does not lead to the concept—or they may be unknown. The definition alone does not lead to forming a concept of the nominatum in the case of those who do not know the object. And once one becomes aware of these objects, one will not need a definition to induce that awareness except inasmuch as one needs a name. Our intention here is to show that the function of the definition and that of the name are equivalent.

32. Sixth, is to say that what leads to forming a concept of reality is, in their view, the complete definition, which consists of essences, not accidents. The mainstay of this argument is the distinction between the essential and the accidental: they argue that the essential is that which is included in quiddity, and the accidental is that which is extraneous to it. They have divided the essential into what is necessary for quiddity and what is necessary for its existence. This argument

<sup>32 &</sup>lt;sup>1</sup> See e.g. Ibn Sīnā, *Ishārāt*, i. 199 ff. (English trans., 53-4).

<sup>[</sup>A]mong the predicates there are those that are constitutive of their subjects. By 'constitutive' I do not mean the predicate which the subject requires for the realization of its existence, such as the fact that a human being is begotten, created or made to exist, and that black is an accident. I mean a predicate which the subject requires for the realization of its quiddity, and which enters (dākhilan) its quiddity as a part of it. Examples are 'figure' for 'triangle,' or 'corporeality' for 'human being.'... You must know that everything that has a quiddity is realized either as

of theirs is based upon two invalid principles: namely, the differentiation [1] between the quiddity and its existence, and [2] between what is essential and what is necessary, concomitant to it.

33. The first principle. They argue that quiddity has a permanent reality, other than its own existence, subsisting outside the mind.<sup>1</sup> This argument is similar to the one espoused by those who hold the non-existent to be a thing.<sup>2</sup> But this is one of the most erroneous of views. The source of their error is that they think that before its coming into existence a thing can be the object of knowledge and intention, and can be distinguished as being capable or incapable of existence, etc. They maintained that 'if a thing were not subsistent [in an external reality other than that of its own existence] it could not be the object of such knowledge and intention [etc.]; we also discourse on the realities of things and their quiddities without considering at the same time that they exist outside the mind', thus the one who is in error imagines that these realities and quiddities are subsistent outside the mind. The truth is that all these<sup>3</sup> are subsistent only4 in the mind, and what is considered to be in the mind is5 greater than what is found in individuals; they are both existent and

existing in individuals or as conceived in the mind, only inasmuch as its parts are present with it. If it has a reality other than its being in existence in one of these two modes of existence, and is not constituted by it, then existence is a concept added to its reality either as necessary or unnecessary. Also the causes of its existence are other than the causes of its quiddity. Humanity, for example, is in itself a certain reality and quiddity, and its existence in individuals or in the minds is not constitutive of it but [only] added to it.

See also Aristotle, Analytica Posteriora, 73<sup>b</sup>2-75<sup>a</sup>35; idem, Topica, 102<sup>b</sup>4-25, passim; and Introduction, Part I, Section 2, above. Cf. Rahman, 'Essence and Existence',

33 <sup>1</sup> Cf. Burrell, 'Essence and Existence', 61-3, and see n. 6 to this paragraph as well as par. 79, n. 2, below.

This view is held by a number of groups and individuals, such as the Mu'tazilīs (particularly Ibn al-Khayyāt) and Ibn 'Arabī. Judging from Ibn Taymiyya's other works, however, he seems to level his criticism mainly against the latter (see Introduction, Part I, Sections 1, 3-4, above). For a more detailed critique, see Ibn Taymiyya, Tawhīd al-Rubūbiyya, 144-59. For the doctrine of Ibn 'Arabī, see his Inshā' al-Dawā'ir, 6ff.; Affifi, Mystical Philosophy, 47ff.; also Shahrastānī, Milal, 53. Incidentally, like Ibn Taymiyya, Ibn Sīnā is also highly critical of this view. See Marmura's section in Encyclopaedia Iranica, iii. 73, s.v. 'Avicenna'.

That is, quiddities and the realities of things (haqā'iq al-ashyā').

<sup>4</sup> The Arabic text does not have 'only', although in al-Radd, 64 (1. -3), Ibn Taymiyya puts the matter thus: 'The truth is that all this is subsistent in the mind, not in the external world.' The last phrase seems to have been omitted by Suyūtī.

<sup>5</sup> In al-Radd, 64 (1. -2), the text reads 'may be greater', which appears more

accurate.

subsistent in the mind. It cannot be said that the quiddities and realities of things are neither existent nor subsistent in the same matter. Therefore, the distinction between existence and quiddity, together with the claim that both are extramental, is a grave error. Those people think that the realities of species, such as the reality of 'man', 'horse', etc., are realities subsistent outside the mind, that they are different from the objects existing outside the mind, and that these realities are eternal and incapable of change. It is these which are called the Platonic Forms.<sup>6</sup>

34. They have not confined themselves only to this claim, but have also affirmed the same of matter (mādda), duration (mudda), and place (makān). They have affirmed that matter independent of form subsists outside the mind, and that this matter is the primary matter (hayūlā) on the basis of which they have constructed the doctrine of the eternity of the World. The majority of scholars have proven them wrong on this score. Our opinion of those who differentiate between existence and quiddity is expressed elsewhere.<sup>2</sup> The aim here, however, is to point out that what they have said in logic about the distinction between quiddity and its existence outside the mind is based upon this false principle. The true difference is that the guiddity of a thing is the representation (rasm) of that thing in the mind, but existence is what exists of that matter outside the mind. This is a valid distinction, for the difference between what exists in the mind and what exists outside it is established, known, and subject to no doubt. The supposition of a reality that subsists neither in our knowledge nor in external existence is erroneous.

<sup>2</sup> See pars. 35-6 below, and al-Radd, 70-1.

<sup>&</sup>lt;sup>6</sup> Ibn Taymiyya's attack here is levelled against the philosophers' distinction between what is necessary for quiddity and what is necessary for its existence, quiddity and existence being separable (Rāzī, Lubāb al-Ishārāt, 79; Burrell, 'Essence and Existence', 60–3). Thus nothing in the external world can be apprehended without that attribute which is necessary for quiddity, whereas without the attribute necessary for existence, a thing can none the less be apprehended. In other words, the essence which is constitutive of quiddity precedes the existence in the external world, this having the clear implication that quiddity has an extramental existence other than the existence of its individuals. This doctrine, as described by Ibn Taymiyya on behalf of the philosophers, comes down to a hard-core realism, espousing the view, vehemently rejected by Ibn Taymiyya, that universals exist outside the mind. Ibn Sınā, Najāt, 256–7; idem, Shifā': Madkhal, 65–72. Also see Introduction, Part I, Section 3, above, and par. 79, n. 2, below.

<sup>34</sup> On the concept of primary matter (hayūlā), see Ghazālī, Maqāsid, 141-3, 158 ff. On the role of matter in the argument for the eternity of the World, see Davidson, *Proofs*, 16-17, and the sources cited therein.

35. The second principle, which has no truth in it, is the distinction between what is a necessary concomitant to quiddity and what is essential to it. If the quiddity outside the mind were stripped of the necessary attributes, and if it were possible to strip the extramental existence of these necessary attributes—even though such an existence may be considered identical with quiddity together with its necessary attributes—doing so would be tantamount to saying 'This existence together with its necessary attributes'. Both, however, are false. For just as evenness and oddness characterize numbers, animality and rationality characterize humanity. If both the attribute and the entity given that attribute occur in the mind, then that entity cannot be perceived without the attribute itself.<sup>2</sup>

36. Their argument that what they have considered to be essential is conceived by the mind first<sup>1</sup> is false on two grounds. First, this has been reported to be their own convention. For they have arbitrarily determined in their own minds that one thing is prior and the other posterior. Whoever holds that the essence precedes the necessary concomitant attributes is blindly following<sup>2</sup> them on this issue. Furthermore, it is known that extramental realities which are independent of us are not subject to our own concepts; thus, if we assume one thing to be prior, and the other posterior, it does not follow that this [is the way they] would exist in the extramental world. All people who imitate the logicians on this point do not have

35 <sup>1</sup> That is, between the essence (dhāt) and the necessary, concomitant accident ('arad lāzim). See par. 27, n. 1, above.

<sup>2</sup> The second and third sentences of this paragraph ('If the quiddity outside the mind... are false') are not found in al-Radd, and seem to be Suyūtī's own formulation. They are extremely elliptic and vague. However, the point Ibn Taymiyya seems to be making is that what the philosophers take as the necessary accident is as crucial for the conception of a matter as the essence itself. When 'blackness', a necessary accident, occurs in the mind, 'colour', an essence, likewise occurs, for without the latter the former can never be conceived. While perhaps agreeing with this, Ibn Taymiyya does not accept 'blackness' as a necessary accidental attribute, for when one sees a black object, blackness will be more strongly affirmed in the mind than the so-called essence of 'colour'. Upon observing such an object, the notion of colour can hardly take hold of the mind as does blackness. See an expanded but somewhat convoluted version of the argument in his al-Radd, 70-1.

36 <sup>1</sup> That is, prior to the object qualified together with its necessary (and separable) accidental attributes.

<sup>&</sup>lt;sup>2</sup> The Arabic term is *qallada* (verbal noun: *taqlid*), namely, following the teachings of an authority without grasping the proofs adduced by such an authority in support of these teachings. See par. 1, n. 1, above.

this priority and posteriority present in their minds. If it were intuitive, natural intelligence (fitra) would apprehend it without imitation,<sup>3</sup> the same way it apprehends all intuitive matters. What is embedded in natural intelligence are qualities necessary to the object qualified, qualities which may or may not occur in the mind. But claiming that one quality is extraneous to the essence while the other inheres therein is completely arbitrary. Nothing in the extramental world or in natural intelligence attests to that. Second, the quality essential to the object qualified belongs to the reality of that object in which the quality exists, whether or not our minds form a concept of it. Therefore, if one quality is essential while another is not, the difference between them must be connected with their external reality which subsists independently of the mind. But when an external reality is found in the mind to be prior and another posterior, they can exist as such only when [their] reality and quiddity are in the mind, not in the external world. And this is a matter that depends on the individual mind. The entire discussion then comes down to matters that subsist in the mind and that have no reality in the external world-matters which represent false suppositions and illusions, with which the logicians' principles are replete.4

37. Seventh, is to ask: in a complete definition which leads to forming a concept of reality, do the logicians require that a concept be formed of all its essential attributes common with other things? If they do require this, then all the attributes must be included. If they

<sup>3</sup> i.e. taqlīd. See preceding note.

<sup>&</sup>lt;sup>4</sup> Having criticized the philosophers' distinction between quiddity and its existence (pars. 33-4), Ibn Taymiyya turns to what he sees as another false philosophical doctrine which distinguishes between the necessary accident (al-'aradī al-lāzim) and the essential attributes (dhātī). Upon observing a black object, he says, the mind apprehends blackness as soon as, if not sooner than, it apprehends the fact that what it is observing is a colour (see par. 35, n. 2, above). Colour is not prior to blackness in the external world; both are attributes existing outside the mind, and any arrangement of precedence giving the former the status of a component of quiddity (juz' al-māhiyya) and the latter the status of a necessary accidental attribute is entirely subjective. When we see a crow, for instance, we cannot perceive what it is without perceiving that it is black. And from the fact that we see that it is black it does not necessarily follow that we must be aware of it as having a colour—no more, at any rate, than being aware that blackness is an accidental attribute. Colour, so Ibn Taymiyya seems to argue, is no more essential than blackness, for both are one and the same in the external world. The only difference between the two, however, is that the latter is particular to crows whereas the former is an attribute common to a larger class of things. See also al-Radd,

do not, and if they content themselves with the immediate genus<sup>1</sup> to the exclusion of other things, then this will be purely arbitrary. And should they be questioned by someone who makes it a requirement to enumerate all genera, or someone who makes it a requirement to exclude all genera,2 they will be unable to produce any answer, except to say that this is their invention and convention. It is well known that real knowledge does not change with the change of circumstances. What they have posited is clearly a matter of invention and convention which they attribute to essential realities and knowledge. This is error itself, and it leads to error; it is like taking two identical persons and judging, merely on the basis of one's own standards and conventions and despite the lack of difference between their essences, that one person is a believer and the other a heretic, that one is learned and the other ignorant, and that one is happy and the other wretched. Thus, with all their claims of upholding the rational syllogism, they distinguish between similarities and treat different things as being similar.

38. Eighth, the condition they have stipulated to the effect that definitions must include distinguishing specific differences (fusul mumayyiza) is incompatible with their distinction between what is essential and what is accidental. For there is no distinguishing differ-

<sup>2</sup> That is, the immediate and distant genera (see preceding note). The point that Ibn Taymiyya seems to be making here is that the inclusion of the immediate genus and difference in a definition is arbitrary, for if the immediate genus is to be included, there is no reason to exclude the distant genera. But if the distant genera are excluded, then the immediate genus must also be excluded, and the difference should suffice in the definition. When we say in defining 'man' 'He is a rational animal', the specific difference, 'rational', indicates nothing but 'man', for it is an essential attribute not shared by any species other than humanity. Thus the mention of the immediate genus is superfluous, and the omission of the distant genera while retaining the immediate genus is arbitrary. See al-Radd, 73 ff.

<sup>37</sup> In the classic example 'man is a rational animal', 'man' is the species of the genus 'animal'; other species are 'horses', 'frogs', 'cats', etc. At the same time, 'a growing body' is the genus of 'man' because 'man', like 'plants', is subsumed under the genus of 'a growing body'. So is the genus of 'absolute body', for 'man' and 'stone' are two species of this 'body'. Thus a species may have more than one genus, depending on the other species with which it shares a genus. If we ask, for example, what 'man' and 'horse' are, the answer will be 'animals'. If, on the other hand, we ask what 'man' and 'stone' are, the answer will then be 'growing bodies'. If we further ask what 'man' and 'stone' are, the answer will be 'absolute bodies'. Now in this configuration 'animal' is the immediate genus (jins qarīb) of 'man', for 'man' stands subsumed with other animals under the genus of 'animal'. 'Absolute body' would constitute a distant genus (jins ba'īd) of 'man', since the latter shares this genus with a class of things outside animality, e.g. stones. See Rāzī, Tahrīr, 50-1; Fārābī, Isāghūjī, 77-8.

[cont.]

ence among the attributes of the definiendum that corresponds to the definiendum in general or in particular without one person considering it as essential and another as accidental and necessary for quiddity.<sup>1</sup>

39. Ninth, their argument involves circularity, and thus it is invalid. The circularity occurs because they hold that no concept of the definiendum may be formed unless its essential attributes are specified. They follow this by maintaining that a concept of the essence must first be formed in order to form a concept of the quiddity. If a person seeking to form a concept cannot conceive the definiendum without first forming a concept of its essential qualities, and if he does not know that the said qualities are essential until he forms a concept of the object which is to be qualified—namely, the definiendum—and if he cannot form a concept of the object qualified until he forms a concept of the essential qualities and distinguishes between them and other qualities, then the apprehension of the essence will depend on the apprehension of what the essential qualities are, and the apprehension of the essential qualities will depend on what the apprehension of the essence is. Thus, neither the essence nor the essential qualities will be known. This is a portentous criticism that destroys the foundations of their doctrine and demonstrates that what they have established is arbitrary and has no foundation in apodictic, truthful principles. They hold, on purely arbitrary grounds, that one thing is of the essence while another is not. They do not employ any means by which the essential may be distinguished from the non-essential. If the definiendum cannot be known without definition, and definition is impossible, then the definiendum cannot be known. Therefore, their doctrine is false.<sup>2</sup>

al-Ishārāt, i. 206, ll. 17-19).

<sup>38 &</sup>lt;sup>1</sup> See pars. 35, n. 2, and 36, n. 4, above.

<sup>39 &</sup>lt;sup>1</sup> See Ghazālī, *Maqāsid*, 44 ff.; Ibn Sīnā, *Najat*, 46; idem, *Ishārāt*, i. 199 (English trans., 54), and par. 36 above.

<sup>2</sup> The argument in this paragraph is as follows. It is impossible to form a concept of

quiddity without first forming a concept of the essential attributes which constitute such quiddity. On the other hand, the essential attributes of a thing cannot be completely distinguished from the accidental attributes without first apprehending the quiddity. This, Ibn Taymiyya declares, involves circularity. In his Sharh al-Ishārāt, i. 200, Tusī acknowledges a problematic element in the definition of the essence, for 'forming a concept of a thing is impossible without first forming a concept of what is essential to it'. This difficulty is multiplied when both Avicenna and Tūsī maintain that the necessary accidental attributes (al-'aradī al-lāzim ghayr al-muqawwim) are identified not by means of other accidents but rather through the essential attributes, by which, we must assume, they meant those attributes that constitute the quiddity (Sharh

40. Tenth, the disagreement amongst them concerning definition cannot be resolved in terms of [their] principles; and what entails the equalization of evidence (takāfu al-adilla) [against and for the truth] is invalid.<sup>2</sup>

## Chapter [3]

41. THIRD POINT: Their Doctrine that no Judgement may be Known Except by Means of Syllogism<sup>2</sup>—whose form and content they have stipulated—is a negative proposition that is not self-evident. Nor have they, in the first place, produced any evidence to prove it. Furthermore, they have made claims that they have not proven, and argued without the benefit of knowledge. Establishing this negative proposition with certitude would be impossible according to their

In al-Radd, 78-9, Ibn Taymiyya gives an example illustrating this circularity. When we define 'man' as 'a rational animal', we do not in fact necessarily apprehend what 'man' is unless we are certain that 'man' possesses the essential attributes of rationality and animality. But in order to be certain that they are essential, we must know that they are not accidental, and in order to know this, we must first know what is essential (namely, quiddity), for without it we cannot know what is accidental.

40 1 The tenth argument does not appear in al-Radd, and I have not been able to

establish a source from which Suyūtī may have appropriated it.

<sup>2</sup> The thrust of these extremely elliptic lines seems to be that since the philosophers' arguments concerning the theory of definition (or, less likely, the more specific issues presented in par. 39) contradict each other and are of equal strength, they must all be false because they cannot all be true. Further on the equality or equalization of evidence (takāfu' al-adilla), see Muwāfaqat Sahīh al-Manqūl, i. 94-5; van Ess, 'Skepticism', 8ff.; Perlmann, 'Ibn Hazm on the Equivalence of Proofs', 279 ff.

- 41 'Third Point' (al-maqām al-thālith) appears neither in Nashshār's edition nor in the Leiden manuscript. However, it is clear from Ibn Taymiyya's own introduction to Jahd (Translation, par. 5) that the refutation of the logicians' proposition that 'No judgement may be known except by means of the syllogism' is one of the four points (maqāmāt). See also al-Radd, 88, where the refutation of this proposition is entitled 'Third Point'.
- <sup>2</sup> The Arabic logicians do not formulate their doctrine in such a clear-cut manner. The means to judgement (tasdīq), they ordinarily state, is hujja (proof), which may be a syllogism, induction, or analogy. See Ibn Sīnā, Najāt, 43; Ghazālī, Maqāsid, 34; Rāzī, Taḥrīr, 20 (II. 11–12). Ibn 'Alī al-Rāzī, Sharh al-Ghurra, 27 (II. 4–7), defines hujja as any inference whose conclusion stems from two known premisses (wal-hujja hiya al-muqaddimatān al-ma'lūmatān). It is safe to state that for the great majority of logicians hujja includes any one of the three arguments (cf. Tūsī, Sharh al-Ishārāt, i. 416). Ibn Taymiyya's statement may thus be justified only in light of the fact that the logicians customarily attach great importance to syllogism and relegate induction and analogy to a marginal status. See Ghazālı, Maqāsid, 37 (I. 16); Tūsī, Sharh al-Ishārāt, i.

own principles. How then did they know that no human being can form a judgement, which they consider to be non-axiomatic, except by means of a logical, categorical syllogism whose content and form they have prescribed?

42. They also acknowledge what is ineluctable—that judgements (tasdiqāt) are either self-evident or acquired, and that they cannot all be acquired because what is acquired is in need of what is self-evident. The difference between the two, as has previously been discussed under the subject of concepts, is relative and relational: what may be acquired for one person may be self-evident for another. A self-evident judgement is that judgement whose two terms, the subject and the predicate, when conceptualized, suffice for obtaining judgemental knowledge, without depending on a middle shared by both of them—namely, the indicant (dalīt)<sup>2</sup> which is the middle term—and regardless of whether the two terms are self-evident or

<sup>42 &</sup>lt;sup>1</sup> Ghazālı, Maqāsid, 34; Ibn Sınā, Shifā': Madkhal, 17–18; Rāzı, Taḥrīr, 12 ff.; Aristotle, Analytica Posteriora, 72<sup>b</sup>17 ff.: 'Our own doctrine is that not all knowledge is demonstrative: on the contrary, knowledge of the immediate premisses is independent of demonstration. (The necessity of this is obvious; for since we must know the prior premisses from which demonstration is drawn, and since the regress must end in immediate truths, those truths must be indemonstrable.)'

<sup>&</sup>lt;sup>2</sup> The term 'indicant' (dalīl) acquired several technical connotations among philosophers and religious scholars. The most general and agreed-upon definition seems to be 'that which leads to what is being sought', be it a conclusion (natija), a legal judgement (hukm), or anything sought after (matlūb). In other words, an indicant is anything which, once known, entails the knowledge of another. Logicians acknowledged two principal meanings of dalil, the first being a synonym of hujja, namely, a syllogistic, inductive, or analogical inference through which a judgement (tasdīq) is formulated, whereas the second is the demonstrative syllogism, defined as a set of premisses which when placed together entail another premiss (= conclusion = natīja). The second meaning also includes a syllogism which proceeds from the effect to the cause, a syllogism known as burhan inna. See, under dalīl, Tahānawī, Kashshāf, i. 492 ff.; Jurjānī, Ta'rīfāt, 93; Marmura, 'Ghazālı and Demonstrative Science', 189 ff. According to most theologians and legal theoreticians, the indicant is that which, once reflected upon soundly, results in certain or probable knowledge about something. Ibn Taymiyya does not attempt a definition of the term, but from the numerous contexts in which it occurs in his writings he appears to use the term in a variety of ways, including those adopted by logicians, theologians, and legal theoreticians. In this paragraph, for instance, he subscribes to the logicians' definition of the indicant as 'affirming the middle term of the minor, and the subsumption of the minor under the middle'. See Jurjānī, Ta'rīfāt, 93. Generally, however, Ibn Taymiyya seems to take the term in its widest possible meaning, thus including such connotations as evidence, middle term, cause ('illa), syllogism, proof, inference, antecedent (in a hypothetical syllogism), analogy, induction. See also Magdisi, al-Bad' wal-Ta'rīkh, i. 30-1, 36, and p. 35 for the difference between 'illa and indicant; Tūfī, 'Alam al-Jadhal, 19-20, 40; Juwaynī, Kāfiya, 46-7, 48; pars. 63, n. 1, 65, 66, n. 1, below.

not. It is well known that people vary in mental aptitude more than they do in physical strength. The quickness and quality of one man's perception may be much greater than that of another. Such a man would then form a complete concept of the two terms so as to reveal through that complete concept the necessary attributes which would not be evident to those who cannot form such a concept. That in some propositions certain people need the middle, which is the indicant, while others do not, is an obvious matter. For many people the proposition may be sensory, empirical, demonstrative, or multiply transmitted (mutawātira), while for others it may be known by means of investigation and inference. Thus, many people do not themselves need an indicant to establish the relation between the predicate and the subject; rather, they need such an indicant only for the sake of others; by giving examples, they clarify for others such a relation by means of proofs for which they themselves have no need.

43. The logicians argue that propositions known through multiple transmission (tawātur), empirical enquiry (tajrība), and sense perception (hawās)<sup>1</sup> are peculiar to those who know them and constitute no arguments against others; these propositions are unlike other propositions which have universal validity and which can be used against an opponent.<sup>2</sup> But this is an invalid distinction and is one of the causes of heresy and unbelief, since the miracles of the prophets are known through multiple transmission. However, on the basis of this distinction a logician may argue: 'To me, such a report is not multiple and therefore I do not take it as an authoritative argument against me.' But this does not constitute a valid condition.<sup>4</sup>

<sup>43 &</sup>lt;sup>1</sup> Instead of hawās (sense perception), the Leiden manuscript and the Bombay edition of al-Radd have it as hads (intuition).

<sup>&</sup>lt;sup>2</sup> See Ibn Sīnā, Ishārāt, i. 397-8 (English trans., 121); Rāzī, Tahrīr, 167 (ll. 11-21); Ghazāli, Mi'yār, 192 (ll. 6-7).

<sup>&</sup>lt;sup>3</sup> On the subjective nature of the multiple transmission of prophetic reports see Hallaq, 'Inductive Corroboration', 11-18.

<sup>&</sup>lt;sup>4</sup> That is, their rejection of the occurrence of *tawātur* does not constitute a condition which precludes them from believing in the contents of the report.

In this paragraph, Ibn Taymiyya attempts to qualify the philosophers' categorical statement that such knowledge as that resulting from the multiple transmission of reports or from empirical and sensory data is highly subjective and thus does not constitute evidence against the opponent. In al-Radd, he divides sensory knowledge into particular and general, the former being derived from particular experience, unique to the individual person, such as tasting or smelling a certain kind of food, feeling hunger or thirst. The latter, however, is common to many, and sometimes to all, people. Consider, for instance, the inhabitants of a village who all know of a mountain existing near their village. They all see the mountain, just as all people see the moon and the sun and know that drinking water quenches one's thirst and that

44. Related to this matter is the rejection by many religious innovators, speculative theologians, and philosophers of the prophetic reports which the traditionists retain. The former say: 'We do not acknowledge these reports' just as the unbelievers proclaim they do not acknowledge prophetic miracles. This happens because they do not know the cause effecting such knowledge. They must accept these miracles as an authoritative argument whether or not the reports were taken by them as multiply transmitted.

45. The philosopher-logicians held ignorant views, such as: the angels are the Ten Intellects, they are pre-existent and eternal, and the intellect is the lord of all beings beneath it. No Jew, Christian, or polytheistic Arab has ever held such a view. Nor did anyone ever argue that an angel is the God of the entire universe. They hold that the Active Intellect is the creator of everything in the sublunar world. This belief also constitutes heresy which no one among the unbelieving people of the Book and the Arab polytheists has embraced. The philosophers argue that God does not act upon His will and power; that He does not know particulars and cannot change the World; that the World is an effusion and has become so without His will, power, or knowledge; that when one seeks intercession

beheading causes death. Common sensory knowledge, however, is of two types, depending on the object perceived. The first type represents the apprehension of one object by all people, as in the case of the sun. The other is an apprehension of the species of that object, for not all people experience the taste of the very oranges that I bought yesterday, but all of them do know what oranges taste like.

In so far as the multiple transmission of reports (mutawātir) is concerned, the generality of people know through such reports of the existence of Mecca and of other important geographical sites, just as they know of the past existence of such figures as Moses, Jesus, and Mahammad. Without advancing further evidence to prove that the knowledge resulting from the mutawātir can be employed against the opponent, Ibn Taymiyya concludes by saying that empirical knowledge, like tawātur knowledge, is not necessarily or always a relative matter, but can be shared by people and thus may bind them. See par. 44 below, and al-Radd, 92-102.

45 <sup>1</sup> That is, while any one of the intellects is not the lord of the intellects above it, it is the lord of all that is beneath it. Cf. Nasr, Cosmological Doctrines, 202-12; Ghazālī, Maqāṣid, 287, 288 ff.; Ibn Rushd, Tahāfut, 183 ff.; Ibn Sınā, Najāt, 280-1; Jāmī, Durra, 41 (English trans., 66-7).

<sup>2</sup> Nasr, Cosmological Doctrines, 203-4; Tūsī, Sharh al-Ishārāt, iii-iv. 659 ff.; Rāzī, Lubāb al-Ishārāt, 105 ff.; Davidson, 'Alfarabi and Avicenna on the Active Intellect', 125 ff.

<sup>3</sup> Tūsī, Sharh al-Ishārāt, iii-iv. 726 ff.; Ibn Rushd, Tahāfut, 146 ff., 226 ff., 447 ff., 460 ff., 471 ff. (English trans., 86 ff., 135 ff., 279 ff., 286 ff., 296 ff.); Ghazālī, Tahāfut, 111 ff. (English trans., 63 ff.); idem, Maqāṣid, 220-2, 233, 239, 371 ff.; Rāzī, Lubāb al-Ishārāt, 87-90; Marmura, 'Avicenna's Theory of God's Knowledge of Particulars', 299-312; Jāmī, Durra, 20 ff., 26 ff., 40 ff. (English trans., 50 ff., 55 ff., 66 ff.); Affifi, 'Ibn 'Arabi', 417; Morewedge, 'Emanationism and Sūfism', 2-3, 9 ff.

from the high substances which one extols, such as intellects, spirits, stars, the sun and the moon, the intercessor comes into contact with the one whose intercession is sought; thus, what is effused from God on these substances will reach the one seeking intercession. <sup>4</sup> They liken this to the sun when it shines against a mirror; the rays falling on the mirror are reflected on another location, thereby causing its illumination. Those rays were directed to that location because of the mirror's reflection, and they reached the mirror because it stood against the sun. They also hold that the angels are the Ten Intellects or the forces of good in the soul, and that demons are the evil forces. They espouse other views which are known to be false by means of rational proofs as well as by immediate knowledge derived from the Religion of the Messenger. If their heresy and unbelief are greater than those of the polytheistic Arabs, how can they aspire to the perfection of the soul while indulging in these follies? This and other similar doctrines require a much more extensive exposition, but the purpose here is to discuss their claims concerning logical demonstration.

46. They also argue that apodictic knowledge does not obtain except by means of demonstration, which is, according to them, the categorical syllogism.<sup>1</sup> In this syllogism, they say, a universal affirmative proposition is necessary.<sup>2</sup> Accordingly, they argue that none of the syllogisms which consist of two negative or two particular propositions produces valid conclusions, whether with respect to their forms, as in categorical, conjunctive, and disjunctive conditional syllogisms, or with respect to their content, as in demonstrative, rhetorical, dialectical, and poetical syllogisms.<sup>3</sup> We argue, however, that if it is necessary to have a universal proposition in all that which they call demonstration, then this universal proposition must be known; that is to say, its universality must be known. Otherwise, if one doubts its universality and thinks it to be particular, no certain

<sup>&</sup>lt;sup>4</sup> Cf. Shahrastānī, Nihāya, 295.

<sup>&</sup>lt;sup>5</sup> Ghazālī, Maqāsid, 290-1, 296-9.

<sup>46 &</sup>lt;sup>1</sup> Aristotle, Topica, 100°25 ff.; idem, Analytica Priora, 24°25 ff.; Ghazālī, Maqāṣid, 37, 66, 110; Ibn Sīnā, Najāt, 69 ff.

<sup>&</sup>lt;sup>2</sup> Rāzī, *Tahrīr*, 140-1; Ibn Abī al-Salt, *Taqwim*, 22; Ghazālī, *Maqāṣid*, 69, 71. However, see Aristotle, *Analytica Priora*, 26<sup>a</sup>16: '[T]here must be a perfect syllogism whenever universality is posited with reference to the major term either affirmatively or negatively.'

<sup>&</sup>lt;sup>5</sup> Ghazāli, Maqāṣid, 69; Ibn Sīnā, Najāt, 70, 85-6; Aristotle, Analytica Priora, 26<sup>b</sup>21 ff.

knowledge will result on the basis of it. A vague and indeterminate proposition whose language allows it to be both universal and particular has the strength of a particular. Since a universal affirmative proposition is necessary in order to reach knowledge by means of a syllogism—to which they apply the term 'demonstration'—it must be said that if the knowledge of such a proposition is axiomatic, each of its terms may, a fortiori, be axiomatic. But should the knowledge be acquired, it would ultimately rest<sup>4</sup> upon self-evident knowledge, and this leads to conjunctive circularity (al-dawr al-ma'ī)<sup>5</sup> or infinite regress of efficient causes (mu'aththirāt), 6 and both are fallacious.

47. The same may be said of all other universal propositions (whether they belong to external or internal sense perception) which they consider to be the foundation of demonstration, and call 'propositions which must necessarily be accepted'. These propositions may be sensory, or they may be empirical, multiply transmitted (mutawātirāt), or intuitive, according to those who consider them to

<sup>&</sup>lt;sup>4</sup> Literally: 'it would require (yahtāj) self-evident knowledge'.

<sup>&</sup>lt;sup>5</sup> Arabic logicians distinguished between two types of circularity, the first being petitio principii (al-dawr al-qabli), where we assume as true what is to be proven, and the other conjunctive circularity (al-dawr al-ma'ī). Unlike the former, conjunctive circularity is not considered as fallacious, since it does not, strictly speaking, beg the question (see second paragraph of next note). Whereas the proposition to be proven in petitio principii presupposes its own validity, the proposition in conjunctive circularity implies another, conjoined proposition (hence the term ma'ī), which in turn implies the first; an example in point is the term 'fatherhood', which implies 'sonship', and 'sonship', in turn, implies 'fatherhood'. See Tahānawī, Kashshāf, i. 467-8, s.v. dawr; and see Ahmadnagarī, Jāmi', ii. 110-13, under the same entry. The choice of the expression 'conjunctive circularity' for al-dawr al-ma'ī is further encouraged by Ibn Taymiyya's use of the concept in conjunction with the term iqtirānī; thus 'al-dawr al-ma'ī al-iqtirānī'. See e.g. Ibn Taymiyya, Tafṣīl al-Ijmāl, 45 (Il. 17-18); idem, Aqwam ma Qīl fī al-Mashī'a, 167 (Il. 13-14). See further par. 247 below.

<sup>&</sup>lt;sup>6</sup> Infinite regress of efficient causes (al-tasalsul fī al-mu'aththirāt) is considered to be the coming into existence of the cause when it produces an effect, for if it did not produce an effect it would not be a cause. In other words, a sufficient cause (mu'aththir tāmm) is not a cause as long as it does not produce an effect. This being so, the cause, in fact, presupposes the effect, and the effect the cause. In contradistinction to the classic infinite regress (tasalsul muta'āqib), this regress is known as tasalsul muqārin, a conjunctive infinite circular regress. See Ibn Taymiyya, Muwāfaqat Sahīh al-Manqūl, i. 215-16; ii. 153.

Now, Ibn Taymiyya's argument in the last few lines of this paragraph seems to be that the fallacy lies in the claim concerning the knowledge of an affirmative categorical proposition. If the proposition is self-evident, then the members or the parts subsumed under it are also self-evident. If, on the other hand, it is inferred (nazarī), then it must ultimately rest upon self-evident knowledge. But a self-evident proposition cannot include members that are not self-evident, hence Ibn Taymiyya's claim for circularity.

<sup>47 1</sup> See Ghazālī, Mi'yār, 186-92, Black, Logic, 97-8.

be certain and thus binding. For example, one knows that moonlight derives from the sun when one observes the moon's shape changing according to its position *vis-à-vis* the sun, as when the moon leaves the sun subsequent to their conjunction in the last night of the month or when they meet in the full moon. They disagree amongst themselves as to whether or not intuition (*hads*) leads to certainty.<sup>2</sup>

- 48. Another example in point is pure rational matters. Yet another example is such statements as 'one is half of two', 'the whole is greater than the part', 'things that are equal to one thing are equal to each other', 'two contraries cannot both be true', and 'two contradictories can neither both be true nor both false'. All these universal propositions which are taken as premisses in demonstration must be able to yield a conclusion without the medium of such demonstration. In fact, this is often the case. If it is known that one is half of two and that half of two is one, it will then be known that this particular one is half of this particular two. The same goes for all the other propositions, without their being inferred by means of a universal proposition. Likewise, it is known that the whole is greater than any of its parts without resorting to a universal proposition. Similarly, he who forms a concept of two contradictories will know that they cannot both be true. Everyone knows that a certain thing, like any other thing, cannot simultaneously exist and not exist. This does not need to be inferred from the statement 'Nothing can simultaneously exist and not exist'. The same can be said of two contraries: one certainly knows that a thing, like all other things, cannot simultaneously be all black and all white, or simultaneously in motion and motionless. To gain such knowledge one does not need a universal proposition stating that 'Nothing can be simultaneously all black and all white, in motion and motionless'.
- 49. Similarly, with respect to all other things which are known to be contraries, if two particulars are known to be contrary to each other it will be known that they cannot simultaneously exist. For knowledge of a universal proposition leads to knowledge of the major premiss which contains the major term, but this is of no use without knowing the minor premiss which contains the minor term. Arriving at the conclusion, that these are two contrary meanings and

<sup>&</sup>lt;sup>2</sup> To the best of my knowledge, the discussions regarding intuition in Ibn Sīnā, Ghazālī, and Qutb al-Dīn al-Rāzī do not indicate noticeable divergence of opinion on this question. Cf. Ibn Sīnā, *Ishārāt*, i. 396-7 (English trans., 121); Ghazālī, *Mi'yār*, 191-2; Rāzī, *Tahrīr*, 166-7.

thus cannot both be true, is possible without knowing the major premiss, namely, that 'No two contraries can both be true'. In order to know this, there is no need for a syllogism, to which they have assigned the term 'demonstration'. This term as found in the Speech of God and His Messenger as well as in the discourse of various religious scholars does not correspond to what they call demonstration; rather, they assign the term 'demonstration' to that which is encompassed by a syllogism whose form and content they themselves have stipulated. A case in point is the following example: if one wishes to refute the argument of those who adhere to the doctrine of states (alahwāl)1 and who argue that these states are neither existent nor nonexistent, one will say: 'These two are contradictories, and any two contradictory matters can neither be both true nor both false, for this would render one thing simultaneously existent and non-existent. It is therefore impossible for a state of a thing to be made simultaneously existent and non-existent. The knowledge that this particular thing cannot be simultaneously existent and non-existent is possible without this universal proposition. Thus, in order to arrive at the conclusion, demonstration is not needed.'

50. Another example is the statement: 'This is possible and anything possible must have that which gives preponderance for its existence over its non-existence'—according to the more valid of the two opinions—or: 'Anything which is possible must have that which gives preponderance to one possibility over the other'—according to the opinion of some scholars. Another statement: 'This is created, and all that is created must have a creator.' The particulars sought after in the universal propositions, namely, 'Everything created requires a creator' and 'Every possible being must be given preponderance by an agent', may be known, in their view, by demonstrative syllogism without such propositions, though they argue that without these propositions demonstration is not possible. It will thus become clear that this particular created thing must have a creator, and that

<sup>49 &</sup>lt;sup>1</sup> Ahwāl (sing.  $h\bar{a}l$ ) represent attributes which are not at first firmly rooted (ghayr rāsikha) in their subject but become so only later, whereupon they will be known as malaka (aptitudinal). One such attribute is the ability to write. While at a rather young age writing is not among the attributes of a person, it later becomes an inseparable attribute of that person. The philosophers held that  $h\bar{a}l$  is an attribute belonging to an existent thing (mawjūd), but is, in itself, neither existent nor non-existent. See under  $h\bar{a}l$  in Ahmadnagarī,  $J\bar{a}mi'$ , ii. 4, and Tahānawı,  $Kashsh\bar{a}f$ , i. 359.

<sup>50 1</sup> Ibn Sīnā, Najāt, 56 ff.; Ghazālī, Mi'yār, 343 ff.

the existence of this particular possible being must be given preponderance by an agent. If one thinks it possible that a thing can be created without a creator and that it can be susceptible to existence and non-existence without an agent giving preponderance for its existence, then one will, a fortiori, think this to be possible with regard to other created things and possible beings. And if one is, in one's own mind, absolutely certain of this, one will not need a demonstrative syllogism in order to arrive at the conclusion, namely, that 'This thing is created, therefore it must have a creator', and that 'This thing is possible, therefore its existence must be given preponderance by an agent'.

51. What will make the matter more clear is that you will find no one who wishes to reach a conclusion through a demonstrative syllogism, whose validity he realizes, without his apprehending that conclusion by means other than this logical demonstrative syllogism. Accordingly, save for these logicians, you will find no one among the learned who constructs his proof from two premisses. Rather, they set forth whatever evidence is needed for the conclusion to be obtained; the evidence may consist of one, two, or three premisses, in accordance with the particular need of the person drawing the inference: people's needs do vary!

and expounded the critique levelled by the learned majority of scholars against those who hold that 'all acquired knowledge must derive from two premisses, and that two are indispensable and none other is needed'. In refuting them one should draw on rational subject-matter which is not inferred from the texts of the prophets, for through it the falsehood of their logic becomes evident. But should one draw on material known from the texts of the prophets, the need for a universal premiss becomes manifest. For example, if we wish to prohibit a type of wine whose legal status has not been determined, we say: 'Wine inebriates and every inebriant is prohibited.' Or we say: 'It is an alcoholic beverage and every alcoholic beverage is prohibited.' Our statement that inebriating wine is an alcoholic beverage is known from the text, namely, the statement of the Prophet, may God bless him: 'Every inebriant is an alcoholic

<sup>2</sup> See Introduction, Part I, Section 5, above.

<sup>52</sup> Ibn Taymiyya attacked Rāzī's writings, including his influential Muhassal, in a number of his treatises, none of which, to the best of my knowledge, was exclusively devoted to a critique of this work. See e.g. Muwāfaqat Ṣahih al-Manqūl, passim.

beverage.'3 Our statement 'Every alcoholic beverage is prohibited' is known from both the text and consensus, and there is no dispute with regard to it. The dispute, however, concerns the minor premiss. It has been authoritatively recorded in Muslim's Sahih that the Prophet said: 'Every inebriant is an alcoholic beverage, and every alcoholic beverage is prohibited.' In another version: 'Every inebriant is an alcoholic beverage, and every inebriant is prohibited.' Some people may think that the Prophet, may God praise him, formulated this in accordance with the logical mode in order to demonstrate the conclusion on the basis of the premiss just as the logicians do. But this is exorbitant ignorance on the part of those who think so. The Prophet, may God praise him, is far above using such methods to expound knowledge. Even those individual scholars in his community who do not have the mind and knowledge of the Prophet would not permit themselves to follow the methods of those logicians. They consider the logicians ignoramuses who know only the arts of arithmetic, medicine, and the like, and who are unfit to occupy themselves with demonstrative, universal, and apodictic sciences, or with metaphysics.

53. Muslim thinkers have exposed this matter in their books and have discussed the logicians extensively. That alcoholic beverages are prohibited is already known to Muslims: they do not need to arrive at this [conclusion] by means of syllogism. Some of them, however, had doubts about certain kinds of inebriating beverages, such as wine made of honey, grain, and other stuffs. In the two Sahīhs1 it is reported of Abū Mūsā al-Ash'arī that he said to the Messenger of God, may God bless him: 'We have a beverage made of honey called bit' and another made of corn called mizr.' The Prophet, whose revelation by then was all-comprehensive, said: 'Every inebriant is prohibited.'2 Thus the Prophet, may God bless him, has answered Muslims with a universal proposition in which he clarified that anything which inebriates is prohibited. He also explained that everything that inebriates is an alcoholic beverage. These are two true and congruous universal propositions; the knowledge of either of them necessarily leads to the knowledge that every inebriant is

<sup>&</sup>lt;sup>3</sup> Muslim, Sahīh, iii. 1587-8, 1205; Bukhārī, al-Jāmi al-Sahīh, iv. 28, 29; Tirmidhī, Sahīh, i. 341-2. For other prophetic reports relative to the prohibition of wines, see Wensinck, Concordance et indices, ii. 79-80.

<sup>53 &</sup>lt;sup>1</sup> i.e. al-Sahīh of Muslim and al-Jāmi' al-Sahīh of Bukhārī.
<sup>2</sup> See Bukhārī, al-Jāmi' al-Sahīh, iv. 29-30, and par. 52, n. 3, above.

prohibited. The knowledge that every inebriant is prohibited does not hinge on knowing both of them. For if a person who believes in the Prophet knows that he, may God bless him, said 'Every inebriant is prohibited', that person will then know that the inebriating wine is prohibited. However, one may be uncertain about whether the Prophet intended the amount or the genus of the inebriant. This uncertainty pertains to the meaning of his words; if his intention becomes clear, the judgement sought will be known. Likewise, if it is known that wine is an alcoholic beverage and that this knowledge is further confirmed by its prohibition, then he who judges the disputed wine to be lawful will not call it an alcoholic beverage. If it is known from the revealed text that every inebriant is an alcoholic beverage, this alone will be a proof for the believers who know that every alcoholic beverage is prohibited. However, he who does not know of the prohibition of alcoholic beverages because he does not believe in the Messenger will not use the Prophet's statement in his inference. Even if he knew that Muhammad is the Messenger of God, but did not know that he prohibited alcoholic beverages, his statement 'Every inebriant is an alcoholic beverage' would be of no use to him. What would be useful to him instead is the statement: 'Every inebriant is prohibited', for only then would he know that alcoholic beverages are prohibited, because 'alcoholic beverage' and 'inebriant' are, according to the Lawgiver, two names for one and the same thing; for the Lawgiver, as well as for the majority of scholars who judge every inebriant as prohibited, the two names are concomitant in both the general ('umum') and the particular (khusus).

54. It is not our purpose here to settle this legal question, but rather to draw attention to the use of examples. The aforementioned example is often cited by Muslim scholars who write about logic. The logicians give examples in a form that is abstracted from concrete matters, and that does not refer to any particular thing, so that the example would not [be understood to] derive from a particular form. For instance, they say:

All A is B
All B is C
Therefore, all A is C

The aim, however, is to arrive at the knowledge of particular matters. One might think that abstracting particulars is needed for arriving at

particulars. But this is not true, for when the logicians are asked to prove the certainty of the two universal premisses which they employ in all their rational syllogisms that are not derived from infallible sources, you will find them introducing arguments on the basis of the particulars sought after without knowing the universal proposition. Knowledge of these premisses therefore does not depend on demonstration. Revealed propositions are not in need of the rational inference they term demonstration. Nor do the rational sciences need their demonstrative syllogism. Thus, the syllogism is needed neither in revealed nor in rational sciences. Therefore, it cannot be argued that knowledge cannot be attained except by means of the demonstrative syllogism they have prescribed.

- 55. What makes the matter clearer is that sensory propositions can only be particular. For if we did not realize by sensations that this flame burns, and that one also burns, [and so on], we would not know that all flames burn. If we make this a universal premiss and say 'All flames burn', we shall have no way of knowing for certain the truthfulness of this universal premiss without knowing, a fortiori, that flames burn in particular instances.<sup>1</sup>
- 56. Someone may say as they do: 'The purpose is not to arrive at the knowledge of particular matters, because demonstration yields only a universal proposition, and the conclusion therefore cannot be but universal.' Universals exist qua universals only in the mind, not in individuals. We maintain that, according to this supposition, demonstration does not lead to the knowledge of things in existence but to matters which are in the mind and which do not subsist in particulars. If demonstration does not lead to the knowledge of existing things, it will then be of little, if any, use. But they do not

<sup>55 &</sup>lt;sup>1</sup> Ibn Taymiyya conceived all worldly knowledge (that is, unrevealed knowledge) as originating in sense perception, whether it is experience or intuition. For him intuition represents what may be called theoretical experience, such as 'observing the changing shape of the moon according to the change of its position vis-à-vis the sun'. As in actual, practical experience, so also in intuition will 'the senses be involved in acquiring the sense data. All knowledge of things in this world, aside from divine knowledge, must begin with particular perceptible things. Only after the process of sensing is complete does the mind come into play in order to universalize the particular sense data. But universalization is the work of the mind, not of the actual enumeration of all instances found in the world. Thus, certainty concerning the universal proposition is not tenable, and the universal proposition, so Ibn Taymiyya seems to say, is no more certain than the knowledge derived from the actual particulars that were subject to our sense perception. See Ibn Taymiyya, Naqd al-Mantiq, 186, 187–8, 202–3, 206, 207; idem, al-Furqān, i. 57; idem, al-Radd, 315–17, 108–9, 371.

admit this,<sup>1</sup> although they use the syllogism for arriving at the knowledge of extramental and metaphysical existents. We have elsewhere explained the truth of the matter; namely, that those things which are sought after in the physical sciences (maṭālib ṭabī'iyya) and which are not based upon necessary, universal [premisses], but upon [premisses that are true] for the most part, do not result in the [apodictic] conclusions the demonstrative syllogism was intended to produce.<sup>2</sup>

57. Their universals in metaphysics are even more erroneous than their universals in physics, and most of their discourse concerning the former is fallacious guesswork, far from being truthful propositions from which a demonstration can be constructed. We have been told through an unbroken chain of transmission about the leading logician [Muhammad b. 'Abd al-Malik] al-Khūnaji, the author of Kashf Asrār al-Mantiq, al-Mūjaz, and other works, that just before he died he said: 'I die having known nothing except that the possible requires (yaftaqir) an agent.' Then he added: "requirement" (iftiqār) is a negative attribute, thus I die knowing nothing'. We have been told the same about another of their prominent scholars. This is a matter known to anyone who is acquainted with them and who knows that they are the most ignorant people on earth with regard to the methods by which rational and revealed knowledge is attained. Exempt from this ignorance is anyone who has studied a science under their guidance but without their logical methods, for his learning will then be derived from that science, not from them. This is true despite the great efforts they have expended in demonstration, by which, they claim, they measure the validity of sciences. If they know something about the sciences, it is not through the methods they have established in logic.

<sup>56 &</sup>lt;sup>1</sup> Literally: 'they do not hold this' (*lā yaqūlūna bi-hādhā*), that is, they do not maintain that the syllogism does not result in knowledge of external particulars.

<sup>&</sup>lt;sup>2</sup> The argument introduced in the last sentence is as follows: as demonstration must ultimately work with propositions that belong to the world of empirical and sensory knowledge, it does not, in fact, rest on true universal propositions, since the knowledge embodied in such propositions derives from the enumeration of the majority of instances and is therefore at best highly probable, but never certain. See also par. 55, n. I, above.

<sup>57</sup> Afdal al-Dīn 'Alī Muḥammad b. Nāmāwar 'Abd al-Malik al-Khūnajī (d. 646/1249), a logician who belonged to the Shāfi'ī legal school. Subkı, *Tabaqāt*, v. 43. Brockelmann (Geschichte, i. 607) lists both works, but gives the former as Kashf al-Asrār 'an Ghawāmiḍ al-Afkār fī al-Mantiq. Mach (Catalogue, p. 270 (no. 3157)) lists another of his works on logic entitled Jumal Qawā'id al-Mantiq. See also Rescher, Development, 194-5 and passim.

58. To prove that the attainment of apodictic, universal knowledge as well as particular knowledge does not need their demonstration, we ought to say that, if there must be a universal proposition, then such a proposition must be known through one means or another. If they know it by means of an inference which proceeds from the observed to the unobserved, then the judgement of a thing would be like the judgement of that which resembles it. Just as we know that this flame burns, we know that the next, unobserved flame will also burn because it resembles the first flame, hence the judgement of a thing is like the judgement of that which is similar to it. We maintain that this is an inference by analogy, which they claim does not yield certainty but mere probability. I Although they have arrived at the universal proposition through analogy, they assert that in matters of certitude analogy leads only to probability.<sup>2</sup> They argue that when particulars are sensed there occurs in the mind a universal knowledge emanating from the Bestower of Intellect; or, alternatively, when sensing particulars, the mind stands prepared to receive the effusion of the universal that emanates from the Bestower of Intellect, or, as they may call it, the Active Intellect, etc. We reply that the argument by which one proves that the universal judgement does exist in the mind must be based on certain knowledge, not mere probability or ignorance.

59. If they argue that such universal propositions obtain axiomatically or necessarily, this position will be tantamount to saying that these universal propositions are known axiomatically or necessarily, and that the mind is compelled to receive such knowledge. Should this be true, the knowledge of individuated particulars and of the species of universals would also occur in the mind axiomatically or necessarily, as is the case in reality. The affirmation of sound-minded people of the existence of individual, sensory matters is stronger than their affirmation of universals, and their affirmation of the universality of species is stronger than their affirmation of the universality of the genera. Knowledge of particulars is closer to natural intelligence than knowledge of universals, and therefore the affirmation of these particulars in natural intelligence is stronger.

<sup>58 &</sup>lt;sup>1</sup> Ghazālī, *Maqāsid*, 90 ff.; Ibn Sīnā, *Ishārāt*, i. 419 (English trans., 130).

<sup>2</sup> Ibn Sīnā, *Ishārāt*, i. 419 (English trans., 129–30); Ījī, *Sharh al-Ghurra*, 198; Khabīsī, *Sharh*, 94.

<sup>&</sup>lt;sup>3</sup> Cf. Ghazālī, Maqāsid, 372-3; and see also Rahman's section in Encyclopaedia Iranica, iii. 83-4, s.v. 'Avicenna'.

The stronger the intellect the more universals it comprehends. Therefore, it should not be said that the knowledge of individuals depends on the knowledge of species and genera. Nor should it be maintained that the knowledge of species depends on the knowledge of genera, for man may be known to be sensuous and to move by will before it is known that individual persons are so, and that humans may be known to be so before it is known that every individual animal is so. Therefore, the knowledge that other animals are sensuous and that they move by will does not depend upon demonstration. For if a judgement concerning all humans and all animals becomes known, the mind will arrive at that judgement through the knowledge that what is unobserved is like that which is observed, or equal to it with regard to the cause which necessitates its being sensuous and moving by will—thereby using analogical and causational inference (qiyās alta'līl), which are employed by the jurists as proofs for establishing legal judgements.

60. The logicians claim that analogy leads to probability, while their syllogism yields certainty. Elsewhere, we have shown that their doctrine is the most fallacious of doctrines and that analogy and the categorical syllogism are identical. They differ only in their particular subject-matter: if the subject-matter is certain in one of them, it will be certain in the other; and if it is probable in one of them, it will be probable in the other. This is the case because the categorical syllogism consists of three terms, the minor, the middle, and the major. The middle term in a syllogism is called in analogy a 'cause', a 'ratio', or a 'common factor'. If someone says concerning the case of wine:

<sup>59 &</sup>lt;sup>1</sup> Causational inference (qiyās al-ta'līl or qiyās al-'illa) is an analogical legal argument based on a 'illa, a ratio legis, found in two particular cases and containing the rationale of the judgement (hukm). A classic example of this analogy is the case of wine, whose inebriating quality explicitly constitutes the cause ('illa) of the prohibition decreed by the Lawgiver. Accordingly, any other substance having the attribute of inebriation must be prescribed as prohibited. In contradistinction to this type of inference, qiyās al-dalāla (indicational analogy) represents a conclusion reached on the basis of a factor which points to, or signifies, but does not specifically stipulate, the ratio legis. For instance, since the Lawgiver allowed levying a tithe ('ushr') on a minor's agricultural produce, the jurists concluded that alms-tax (zakāt) is also to be collected. Unlike the intoxicating quality of the wine, tithe was not itself the cause but only a means to pointing out the judgement on the basis of the equivalence between the two types of taxes. Amidī, Ihkām, iii. 96-7; Ibn Qudāma, Rawdat al-Nāzir, 280-1; Shīrāzī, Luma', 65-6.

<sup>60 &</sup>lt;sup>1</sup> See par. 58, nn. 1 and 2, above.

<sup>&</sup>lt;sup>2</sup> See pars. 292-301 below.

<sup>&</sup>lt;sup>3</sup> See par. 59, n. 1, above.

'All wines inebriate', and 'All inebriants are prohibited', he must prove the major premiss in order to complete the syllogism. He will then be able to say: 'Wine inebriates; therefore, it is prohibited, in a manner analogous to grape-wine, on the grounds that they possess in common the factor of inebriation.' For inebriation is the ratio of prohibition in the original case, and inebriation is also found in the assimilated case. Ergo, whatever determines that 'All inebriants are prohibited' a fortiori determines that inebriation is the ratio of prohibition. Determining the judgement in the case of an analogy is easier because the original case attests to the prohibition of inebriation, and thus the judgement will be known to have been established in certain particulars.

61. In analogy it is not sufficient—as some scholars have mistakenly thought—to affirm a judgement in one particular just because the judgement is found in another particular, on the grounds that they both share a matter in common, but a matter which has not been proven necessarily to entail a judgement. Rather, it must be established that the factor common to both of them necessarily entails a judgement, and that that common factor is the middle term. Jurists and legal theoreticians call this matter 'the enquiry into the efficiency of the attribute in the judgement'. This is the most central query in analogy, and its answer is frequently needed in order to assess the validity of analogical reasoning. The opponent may reject the attribute in the original case, or the judgement of that case; he may reject the attribute in the assimilated case, or he may reject the attribute as a cause of the judgement. He may argue: 'I do not concede that what you have determined to be the common attribute is the cause or the indicant of the cause.' In order to prove that it is, evidence must be provided by either the texts, consensus, Classification and Successive Elimination (al-sabr wal-tagsīm), Relevancy (munāsaba), or

<sup>&</sup>lt;sup>4</sup> That is, he must prove the universality of the major premiss 'All inebriants are prohibited', which, in this case, finds its justification in the prophetic Sunna. See par. 52, n. 3, above.

<sup>5</sup> Legal analogy consists of four elements: (a) the original case or the procedent (a)

<sup>5</sup> Legal analogy consists of four elements: (a) the original case or the precedent (asl) found in one of the primary sources of the law, (b) the assimilated or new case (far') whose solution is to be determined, (c) the cause, ratio legis, or the relevant similarity ('illa) between the original and the assimilated cases, and (d) the judgement (hukm) or the decision which is transferred from the original to the assimilated case. See Bājī, Hudūd, 69-73. For further detail see Ghazālī, Mustasfā, ii. 228 ff.

<sup>61 1</sup> Āmidī, Ihkām, iii. 152; Bājī, Hudūd, 75-6.

<sup>&</sup>lt;sup>2</sup> The method of Classification and Successive Elimination (al-sabr wal-taqsim) is employed in establishing the cause of, or the rationale behind, the judgement decreed

Coextensiveness-cum-Coexclusiveness  $(dawar\bar{a}n)^4$ —for those who follow such methods. What proves that the common attribute which necessitates the judgement is either the cause or the indicant of the cause, is that which indicates that the middle term necessarily entails the major term, as well as indicating the validity of the major premiss. Thus, if the cause itself were established, the inference would be a causal demonstration (burhān 'illa); and if its indicant were established, the inference would be an indicative demonstration (burhān dalāla). When syllogism leads to probability and not to certainty, the major premiss will only be probable. This is an obvious matter. Hence, many jurists use the categorical syllogism in law in the same manner analogy is employed in rational sciences. The one is identical with the other.

62. Those later theologians and thinkers—such as Abu al-Ma'ālī [al-Juwaynī], Abū Ḥamid [al-Ghazālī], al-Rāzī, Abū Muḥammad al-Maqdisī, and others—who argue that rational sciences, unlike legal sciences, do not employ analogy and that they rest upon absolute

in the original case (see par. 60, n. 5, above). By this method, the jurist identifies all candidates which are thought to be the possible causes of the judgement and subsequently eliminates those which are less likely than others to constitute a cause, until such a point when he is left with only one. This last is considered to be, with the highest degree of probability, the cause of the judgement. Formally, this argument involves the conditional disjunctive syllogism. See par. 203 below, and Ibn Qudāma, Rawdat al-Nāzir, 25; Ibn Sīnā, Najāt, 86; Jurjānī, Ta'rīfāt, 102-3, s.v. al-sabr wal-taqsīm; Ghazālī, Mustasfā, ii. 295-6; idem, Mi'yār, 156-8.

When the cause in the original case is identifiable and is known to result in a judgement which serves the purposes of the law (such as the avoidance of undue hardships and the protection of public interest), the relationship between the cause (ratio legis) and its judgement is said to be relevant (munāsiba). See Āmidī, Ihkām, iii. 68. Further on munāsaba, see Ibn al-Humām, Tahrīr, 449 ff.

- <sup>4</sup> Dawarān (Coextensiveness-cum-Coexclusiveness) represents a chronologically later nomenclature for a combination of the two methods used in identifying the cause, namely, tard (Coextensiveness) and 'aks (Coexclusiveness). In tard the judgement of the original case must exist whenever the cause exists, and in 'aks it must not exist when the cause cannot be found. Wine, for example, is judged as prohibited because it is an inebriant; when it ceases to be an inebriant, as when it ferments into vinegar, the judgement, prohibition, must be removed. See Tahānawī, Kashshāf, i. 469, s.v. dawarān. Further on this method see Ibn al-Humām, Tahrır, 468 ff.
  - <sup>5</sup> See Ibn al-Humām, Tahrīr, 468, 489.

<sup>6</sup> See par. 59, n. 1, above.

- <sup>7</sup> See e.g. Ibn Qudāma, Rawdat al-Nāzir, 22 ff., 25 (ll. 17-18); Ibn al-Hājib, Muntahā al-Wusūl, 6-11; Ibn al-Humām, Tahrīr, 11-15.
- 62 <sup>1</sup> Muwaffaq al-Dîn Abū Muḥammad 'Abd Allāh Ibn Qudāma al-Maqdisī was a distinguished Ḥanbalī jurist and theologian (d. 620/1223). See Ibn Rajab, *Dhayl*, ii. 133-49 (no. 272); *Encyclopaedia of Islam*<sup>2</sup>, iii. 842-3, s.v. 'Ibn Kudāma al-Makdisī' (by G. Makdisī).

rational indicants,<sup>2</sup> have departed from the views of Muslim thinkers as well as of other sound-minded scholars. Indeed, analogy is employed in the rational sciences just as it is used in the legal sciences. For when the common factor<sup>3</sup> is proven necessarily to entail a judgement, this proof will constitute evidence in all sciences. And when it is proven that there is no efficient difference (*farq mu'aththir*) between the assimilated and original cases,<sup>4</sup> this too will constitute a proof (*dalīl*) in all sciences. Wherever analogy cannot be used, categorical syllogism cannot be used either.

63. Abū al-Ma alī [al-Juwaynī] and the thinkers before him neither followed nor approved of the logicians' method. Rather, they drew inferences on the basis of indicants which, according to them, necessarily entail what they indicate, without, however, resorting to the methods of the logicians. The majority of thinkers infer the unobserved from the observed if the common factor necessitates the judgement. Likewise, they draw an analogy between them on the basis of the common term, the cause, the condition (shart), and the indicant.<sup>1</sup> Their adversaries contend that 'the judgement of what is unobserved is established not on account of its being found in that which is observed, but rather because the universal proposition itself is sufficient for that purpose without the need for analogy'. We reply: the same is the case in legal sciences, for when there exists evidence that the judgement is contingent upon the common attribute, the original case is not needed. The very evidence which indicates that the judgement is contingent upon the attribute is sufficient. But since this evidence is universal and since the universal does not [externally]

<sup>&</sup>lt;sup>2</sup> See e.g. Juwaynī, Burhān, vol. ii. par. 694

<sup>3</sup> i.e. the middle term, the cause.

<sup>&</sup>lt;sup>4</sup> When the difference between the original and the assimilated cases is said to be efficient, it means that such a difference supersedes any similarity between the two cases that might be deemed relevant. The efficient difference between white wine and vinegar, namely the intoxicant attribute found in wine and absent from vinegar, precludes treating the two substances as equal, although both share the attributes of being white, liquid, and a vine product. This consideration stands in contrast with the ordinary procedure employed in drawing an analogy, whereby any difference between the two particulars (cases) must be proven as irrelevant (ilghā' al-fāriq). Ibn Qudāma, Rawdat al-Nāzir, 262-3; Ibn al-Humām, Tahrīr, 479 ff.

<sup>63</sup> ¹ The common term (al-jam' bil-hadd: lit. bringing two particulars together on the basis of a term, i.e. the middle), the cause ('illa), the condition (shart), and the indicant (dalil) are different names for the element of similarity found between two things. The least common of these terms is the condition, which refers to the relevant similarity without which analogy cannot be drawn. See under hadd mushtarak, dalil, shart, and 'illa, in Jurjāni, Ta'rīfāt, 73, 93, 110-11, 134.

exist except individually, one will know that through the individuation of the original case that universal is realized (tahaqqaqa). This matter is useful in legal as well as the rational sciences. Therefore, you will know that whenever there exists in an inference evidence indicating that the common factor is the ratio of the judgement, or that the [efficient] differences between the original and the assimilated cases are non-existent,<sup>2</sup> the inference will constitute a valid analogy and a sound indicant in whatever science it is used.

64. Scholars have disagreed concerning the term  $qiy\bar{a}s$ . A group of legal theoreticians, such as Abū Ḥamid al-Ghazālī and Abū Muḥammad al-Maqdisı, have argued that the term is used in its real sense ( $haq\bar{i}qa$ ) in analogy but in its metaphorical sense in the categorical syllogism. Another group, such as Ibn Ḥazm and others, has argued that, to the contrary,  $qiy\bar{a}s$  is used in its real sense in the categorical syllogism and metaphorically in analogy. The majority of scholars, however, argue that it is used in its real sense in both of them, and that rational  $qiy\bar{a}s$  applies to both of them. This view, which is correct, is held by most of those who have discoursed on the principles of Religion ( $us\bar{u}l$  al- $d\bar{u}n$ ), the principles of Law ( $us\bar{u}l$  al-fiqh), and a variety of rational sciences. The essence ( $haq\bar{u}qa$ ) of the one is identical with the essence of the other; they differ only in form.

65. Linguistically, qiyās means the measuring of one thing against another. This involves measuring a particular thing by another particular thing similar to it, as well as measuring a particular by a universal under which it is subsumed together with other particulars similar to it. For, in the mind, the universal is an analogue of its particulars, and that is why it applies and corresponds to them. In a categorical syllogism the mind proceeds from the particular to the general, common, and universal meaning which applies to it as well

<sup>&</sup>lt;sup>2</sup> See par. 62, n. 4, above.

<sup>64 &</sup>lt;sup>1</sup> Cf. Ibn Qudāma, Rawdat al-Nāzir, 22, where he declares the following:

We have mentioned that demonstration consists of two premisses from which results a conclusion. If the premisses are not certain, the inference will not be called demonstration; and if they are probable, the inference is called juridical syllogism (qiyāsan fiqhiyyan)... However, giving it the name qiyās is metaphorical (majāz), for it involves the subsumption of a particular under a universal; qiyās, on the other hand, is measuring one thing by means of another.

<sup>&</sup>lt;sup>2</sup> Ibn Hazm, *Taqrīb*, 308, rejects the application of the term *qiyās* to inductive reasoning.

<sup>&</sup>lt;sup>3</sup> See e.g. Qarāfī, Tanqīh al-Fusūl, 384; Ibn al-Humām, Tahrīr, 415.

as to other particulars; the mind thus judges the particular in accordance with what is necessary to the common universal by proceeding from that consequent universal to the first antecedent, which is the particular. Categorical syllogism is thus a passage from a particular to a general, and then from that general to the particular; that is, it proceeds from a particular to a universal, and then from that universal to the first particular, which is then judged by that universal. Accordingly, the indicant is more specific than that which it indicates, namely, the judgement. For the existence of the indicant necessitates the existence of the judgement; the consequent cannot be more specific than its antecedent, but rather more general than, or equal to it.<sup>2</sup> This is what is meant when one says that it is more general.

66. But what is indicated—namely, the locus of the judgement, the matter judged, predicated and qualified, the subject<sup>1</sup>—is either more specific than the indicant or equal to it. What is indicated is described as more specific than the indicant, but not more general. For if it were more general, the indicant would not be concomitant with it, and therefore the judgement would not be known to be affirmed of it, and thus it would not be an indicant. It will be an indicant only when it is a consequent of the matter judged, namely, that which is qualified and predicated, and which is called the subject (mawdū, mubtada). It necessarily entails a judgement (hukm) which is the attribute, the predicate,<sup>2</sup> the judgement (hukm)—and it is called the predicate (mahmūl, khabar). An example in point is inebri-

<sup>65 &</sup>lt;sup>1</sup> The universal, Ibn Taymiyya seems to say, is a generalization based on an attribute or attributes found in these particulars. A syllogism then represents the subsumption of a particular, which itself constitutes the source of the generalization, under a universal which is an analogue (mithāl) common to all its particulars. See Introduction, Part I, Section 3, above.

<sup>&</sup>lt;sup>2</sup> As here used by Ibn Taymiyya, the indicant, or the antecedent, is the particular, and that which is indicated is the consequent or the universal. See par. 66, n. 1, below.

<sup>66</sup> In the previous paragraph, the indicant is used for the particular which leads to the universal, the latter being the abstracted analogue of its particulars. In this paragraph, Ibn Taymiyya is speaking of the indicant embodied in the major premiss of the syllogism. For what is indicated in the process of generalization from the particular is the resultant universal statement. But once we arrive at the universal premiss, the indicant becomes this very premiss, and what is indicated is the particular, i.e. the subject of the predicate in the conclusion. Thus, if the conclusion is more general than the premisses, then it will go beyond them and will not follow from them necessarily. This relation between the premisses and the conclusion entails that part of the conclusion (what is indicated) will remain even after we have deleted the premisses. Therefore, the concomitance of the premisses with the conclusion will not be tenable.

<sup>&</sup>lt;sup>2</sup> See par. 150, n. 1, below.

ation, which is more general than the disputed case of wine and more specific than prohibition. The indicant may be equal in generality and specificity to the judgement, and it may be concomitant with what is judged. Such is the mode of reasoning on the basis of the indicant, irrespective of whether or not it is cast in the form of the categorical syllogism or that of analogy. It is a matter understood in the mind, though language cannot express it. Accordingly, people infer conclusions on the basis of evidence without expressing their inferences in words explaining what they have in mind. They may express their inferences in clear terms, though they may not adhere to the method of a particular group of theologians, logicians, or others. Knowledge of the antecedent must be clear either in itself or through an alternative indicant.

67. As for analogy, it represents the passage of the mind from one particular judgement to another on the ground that they share a universal, common meaning, since the judgement is concomitant with that meaning. Furthermore, as has previously been mentioned, the concomitance must be established on some grounds if it is not obvious. The mind first forms a concept of the two particulars namely, the original and the assimilated cases<sup>1</sup>—then it proceeds to the concomitant-namely, the common element-then to the concomitant of the concomitant, which is the judgement. The judgement must be known to be the concomitant of the common element, which in that context is termed a major premiss. The mind then proceeds to affirm the consequent of the first particular antecedent. Thus, in fact, both the syllogism and analogy are identical. They differ only in the manner in which they form and cast the indicant. But the reality which creates an indicant, that is, which makes it entail that which it indicates, is one and the same.<sup>2</sup>

<sup>67 &</sup>lt;sup>1</sup> For a definition of the assimilated and original cases, see par. 60, n. 5, above. <sup>2</sup> The assumption underlying the view that the syllogism is substantively equivalent to analogy rests on the denial of the universal as something existing outside the mind, independently of its particulars. Ibn Taymiyya holds the universal to be a sort of abstraction of particulars which exist in the real world and are subject to our sense perception. Since all knowledge—with the exception of revealed truths, which obviously need no syllogism—exists as particular, any generalization of such knowledge remains probable. Accordingly, whenever the subject-matter is not apodictic, both syllogism and analogy yield probable knowledge. Whether Ibn Taymiyya distinguished between degrees of syllogistic and analogical probability is another matter, which cannot be discussed here. But there is no doubt that Ibn Taymiyya would acknowledge the possibility that a universal proposition in the syllogism is based on more than one particular, whereas analogy may be limited to only one (see Introduction, Part I,

68. It is out of ignorance and error that they give as an example of analogy the following: 'Heaven is composite; therefore, it is contingent, analogous to man.' Then against this analogy they produce objections. Had they said: 'Heaven is composite' and 'Every composite is contingent' there would be even more objections against this example. If the categorical syllogism is employed with regard to an evident matter, there will be no difference between it and analogy. For the universal in the mind is an analogue of its particulars, and it is for this reason that the categorical syllogism corresponds to and agrees with analogy; in fact, analogy may be more demonstrable, and because of this, sound-minded people reason by means of it.

69. As for their argument that a definition cannot be formulated through similitude (mithal), it would be true of that similitude by which no distinction can be drawn between the definiendum and other things, so that by means of similitude one knows what is concomitant to the definiendum, coextensively and coexclusively; that is, the definition would exist wherever the definiendum exists and would be absent wherever the definiendum is absent. It is by means of the definition that the corresponding, concomitant definiendum is distinguished both coextensively and coexclusively; whenever the definition occurs, the definiendum will be distinguished from other things. I The majority of scholars conceive of the definition thus. They do not admit the inclusion of the general genus (al-jins al-'āmm') in the definition. For if the intention is to define by means of a name, then when a non-Arab asks about the meaning of khubz he will be shown a loaf of bread and told 'This is it'; and he will then understand that khubz is a term which encompasses all that is bread, whether or not it is in the shape of a loaf.

70. We have discussed the views of the speculative theologians and the logicians in detail in our discourse about al-Muhassal and in

Section 6, above). Ultimately, having eliminated the possibility of a demonstrative syllogism, the probabilistic distinction is reduced to a choice between analogy and imperfect induction, the latter representing the highest probable means by which the major premiss of the syllogism is reached.

<sup>&</sup>lt;sup>1</sup> See par. 15, n. 1, above.

<sup>69 1</sup> See par. 15, n. 1, above.

2 The general or high genus (jins 'āmm, or jins 'alī) is the broadest category under which a thing may be subsumed. When asked, for instance, to define an object we are looking at, we may say it is a palm, a tree, a plant, a body. A palm is the species of the genus 'tree', and tree, at the same time, is the species of the genus 'plant', and so on. In this example, 'body' is said to be the most general or the highest genus of a palm tree. See Fārābī, İsāghūjī, 76-7; Ibn Tumlūs, Madkhal, 36-7.

other works.<sup>1</sup> The issue is expressed in abstract examples.<sup>2</sup> If the purpose is to prove that 'All A is C' with the middle term as B, it should be said:<sup>3</sup>

All A is B All B is C Therefore, all A is C

Someone may say: "A is C" is inferred on the basis of D, since D is C. "D is C" because D is B, and since also "A is B", therefore "A is C" on the grounds that they possess in common that which entails C, namely B.' This example, like the one preceding it, is valid, but there is here an additional inference on the basis of which A was concluded, though the middle term, B, is predicated of A.

- 71. We say: their statement to the effect that demonstration must include a universal premiss is valid; and it is for this reason that through demonstration they can arrive only at universal conclusions. They also maintain that demonstration results only in universals, and that the highest universals are the pure intelligibles which do not admit of change or permutation. Through these intelligibles the soul reaches perfection and becomes an intelligible world which parallels the existing world, unlike propositions, which undergo permutation and change.<sup>1</sup>
- 72. If what is sought through demonstration is intelligible universals which do not admit of change or permutation, then these universals must obtain by means of rational propositions whose acceptance is necessary—nay, by means of propositions whose modality is necessity, as in the examples 'Every human is an animal' and 'Every existent being is either necessary or possible', as well as other such universal propositions which do not admit of change. Thus, they classify sciences into three types: [1] that which cannot be abstracted from matter, neither in the mind nor in the external world; namely, physics, whose object is the body; [2] that which is abstracted from matter in

<sup>70 1</sup> See par. 52, n. 1, above.

<sup>&</sup>lt;sup>2</sup> i.e. in symbolic notation.

<sup>&</sup>lt;sup>3</sup> As it stands, this syllogism represents the fourth figure. However, it is likely that Ibn Taymiyya meant to place the two premisses in the opposite order, thereby producing the first figure.

<sup>71 &</sup>lt;sup>1</sup> Cf. Ibn Sīnā, Najāt, 102 ff., 106 (l. 4), 328; Ghazālī, Maqāṣid, 279, 272-3; Badawī, Plotinus apud Arabes, 26 ff., 32 ff.

<sup>72 1</sup> Ibn Sīnā, Shifā': Madkhal, 14; Ghazālī, Maqāsid, 31-2, 138-9.

the mind but not in the external world; namely, mathematics, which treats quantity and number; and [3] that which is abstracted from matter in both the mind and the external world; namely, metaphysics, whose object is the Absolute Existence (al-wujūd al-mutlaq) and other issues related to it qua existence—such as dividing it into the necessary and the possible, and into substance and accident, and dividing substance into the subsistent (hāl) and the substratum (maḥall), and into what is neither a subsistent nor a substratum, but has the relation of governance, and into what is neither subsistent nor a substratum and does not have such a relation. The first [type of substance] is form, and the second is matter, namely, prime matter (al-hayūlā), whose meaning in their language is substratum. The third is soul, and the fourth is intellect.<sup>2</sup>

73. Most of the philosophers consider the first as part of the category of substance, but a group of the later philosophers, such as Ibn Sīnā, refrained from calling it substance. This group held that when substance exists, its existence is not in a subject (mawdū'); that is, it is not in a substratum where the subsistent can be dispensed with; rather, it is found in that whose existence is other than its quiddity. And since this is not the case with the First, He is therefore not substance. They disagreed with their predecessors in this regard² and disputed the issue with them on mere verbal grounds, but could not come up with an alternative opinion which is valid and rational. Assigning the name 'substance' to that which they uphold is a matter of convention. They also maintain that substance is anything which is not in a subject (fī mawdū'),³ just as the theologians say it is anything which is self-subsisting, bounded (mutahayyiz),⁴ maintains attributes, or sustains accidents, etc.5

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā, Najāt, 135 ff., 236-44; Rāzī, Lubāb al-Ishārāt, 48-55; idem, Muhassal, 57-8; Badawī, Plotinus apud Arabes, 26-7; Ghazālī, Maqāsid, 140 ff.; see also under Jawhar in Jurjānī, Ta'rīfāt, 70-1, and in Āmidī, Mubīn, 109-11.

<sup>73 &</sup>lt;sup>1</sup> That is, God is not substance. Cf. Āmidī, Abkār, fols. 73a f.; Ibn Sīnā, Najāt, 213-17; idem, Hudūd, 23-4; Rāzī, Muḥassal, 83.

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā , Hudūd, 24, 18.

<sup>&</sup>lt;sup>3</sup> Ibid. 24 (ll. 2-8); Ghazālı, *Mi'yār*, 300-1.

<sup>&</sup>lt;sup>4</sup> In kalām, hayyiz is the void or space occupied by a material body or non-material entity, such as substance (jawhar). Mutahayyiz is such a body. See Jurjānī, Ta'rīfāt, 83-4, s.v. al-hayyiz; Tahānawī, Kashshāf, i. 300, s.v. mutahayyiz; Muwāfaqat Sahīh al-Manqūl, i. 144, ii. 107; Ibn Sīnā, Najāt, 171 ff.; Taftāzānī, Sharh al-'Aqā'id, 25, 36-8 (English trans., 29-30, 41-2). For further sources, see Āmidī, Abkār, fols. 73a f.

<sup>&</sup>lt;sup>5</sup> Taftāzānī, Sharh al-'Aqā'id, 25 ff., 37 ff.; Āmidī, Mubīn, 110; Tahānawī, Kashshāf, i. 203-7 (s.v. Jawhar), 300 (s.v. Mutahayyiz).

74. As to the substantive aspect of their alternative opinion, their claim that the existence of the possibles is superadded to their quiddity in the external world is invalid. Their claim that the First<sup>2</sup> is an existence conditioned by negativity is also invalid, as we have expounded elsewhere.<sup>3</sup> However, our aim here is to speak of demonstration.

75. It must then be said: in addition to misleading some people, the logicians' discourse is embellished and contains falsehoods that require lengthy description. We shall point only to some of them here. They are as follows. First, it should be said that if demonstration results only in universals, and if universals are substantiated in the minds but not in individuals, and if in the external world there exist only individuals, then no individual can be apprehended by means of demonstration. Nor can any existent be apprehended by means of such demonstration; rather, only matters in the mind may be so apprehended. It is known that even if the soul is assumed to reach perfection only through knowledge—though this proposition is false, as we have explained elsewhere -demonstration does not constitute such knowledge, for the soul neither knows any of the existents, nor does it become an intelligible world parallel to the existing world. It would rather become a world of mental, universal matters through which nothing of the existing world could be known. In this knowledge there is no benefit, much less the attainment of perfection.

76. Second, we say: the highest of all existent beings is the Necessary Existent, whose existence is particular, not universal, for in the universal it is not impossible to conceive plurality (sharika). But the occurrence of plurality in the Necessary Existent is inconceivable, even if that which precludes conceiving the occurrence of plurality in it is unknown. Indeed, if it becomes known that a universal matter is common to both the Necessary Existent and another matter, it is not the Necessary Existent which will be known. Furthermore, in their view, the intelligible substances which are the Ten Intellects—or more than ten, as maintained by such philosophers as al-Suhrawardī

<sup>74</sup> Ibn Taymiyya views the later logicians' criticism of their predecessors' doctrine from two perspectives; the first, expressed in par. 73, is linguistic (lafzt) and the other, expressed in this paragraph, is substantive (ma'nawı).

<sup>&</sup>lt;sup>2</sup> See par. 73 above. <sup>3</sup> al-Radd, 64-9.

<sup>75 1</sup> Cf. al-Radd, 122 ff.; and par. 71 above.

<sup>76</sup> That is, the conception of the universal does not disallow its being predicable of many. Cf. Lawkari, Bayan al-Haqq, 135.

al-Maqtūl,<sup>2</sup> Abū al-Barakāt [al-Baghdādī],<sup>3</sup> and others—are individual, not universal substances. If we know only universals, then we shall know nothing of these substances. The same may be said of the celestial bodies, which they say are eternal and everlasting. If we know the universals only, then these bodies cannot be known, and thus we shall know neither the Necessary Existent nor the Intellects; neither anything of the souls nor the celestial bodies; neither the elements nor the generating substances. And these, according to them, are the entirety of the existents. What sort of knowledge, then, is that through which the soul reaches perfection?

77. Third, I by classifying the sciences into physics, mathematics, and metaphysics—and by ranking mathematics above physics, and metaphysics above mathematics<sup>2</sup>—the logicians have distorted reality. Physics, which is the knowledge of the bodies existing in the external world, the principles of their movement, their transformation from one state to another, and their disposition, is superior to the mere calculation of abstract quantities and numbers. If man were to conceive of only a circle, a triangle, a square, or abstract numbers—or of all that which is found in Euclid—he would possess no knowledge of existent beings in the external world. And this does not lead to the perfection of the soul. Had countables and external quantities, which are bodies and accidents, not been required in the knowledge of

<sup>&</sup>lt;sup>2</sup> See the rather vague statement in Suhrawardī, *Hikmat al-Ishrāq*, ii. 138-48, 155; See also Abu Rayyān, *Uṣul al-Falsafa al-Ishrāqiyya*, 164; Landolt, 'Suhrawardı's "Tales of Initiation", 479.

<sup>&</sup>lt;sup>3</sup> This claim has proven difficult to substantiate in Baghdādī's work. However, see a somewhat indirect statement to this effect in *al-Mu'tabar*, iii. 156-7. See also Pines, 'Note', 175 ff.

The third argument in Suyūtī's abridgement is in fact the fourth in al-Radd. Suyūtī's reason for excluding the original third argument, which treats of the philosophical theory of universals, may well have been this, that the argument is often invoked throughout the treatise as the source of numerous logical and metaphysical errors (see Introduction, Part I, Section 3, above). Ibn Taymiyya retained the belief that since metaphysics, the supreme philosophical science, investigates the nature of universal existence (al-wujūd al-kullī), knowledge of any deity would be neither valid nor true. For all universals exist only in the mind, and the philosophers' metaphysics is nothing but a set of generalizations expressing a knowledge of a common attribute that is conceived by the mind to exist among individuals. The common attribute does not reveal the distinctive qualities under which individuals are subsumed. The intelligible attribute common to real particulars is mental and has no real existence. On 'existence' as the main occupation of metaphysics and the latter's supremacy over other philosophical disciplines, see Ghazālī, Maqāṣid, 133, 136. For Ibn Taymiyya's argument, see al-Radd, 129-33, and par. 79 below.

<sup>&</sup>lt;sup>2</sup> See par. 72, n. 1, above.

physics, it would not have been considered a science. They have considered the science of geometry as an introduction to the study of astronomy so they can utilize it in the demonstrations of astronomy or derive from it benefit in the construction of material life. This is the case despite the fact that their syllogistic demonstration cannot prove, coextensively (muttarida), conclusively, or validly, anything except these mathematical matters. Thus arithmetic and geometry, which are sciences treating, respectively, of discrete and continuous quantities,4 are apodictic sciences which allow for no contradiction whatsoever. An example of this is the addition, division, and multiplication of numbers, and their ratio to each other. If you add 100 to 100, you will know that it is 200, and if you divide 100 by 10, it will be 10, and if you multiply that by 10, the result will be 100. Multiplication is the opposite of division. The multiplication of integers is the process of rendering one number the times of another number, and if the result of this multiplication is divided by one of the two numbers, the other number will result. Likewise, if the number resulting from division is multiplied by the divisor, the dividend will result. Thus, the dividend is equivalent to the number resulting from multiplication, and each of the two numbers multiplied is equivalent to the dividend or the divisor. The ratio brings all these numbers together; the ratio of one of the two numbers multiplied to the product is the same as the ratio of unity to the other number multiplied, and the ratio of the product to one of the two numbers multiplied is the same ratio as that of the other number to unity.

78. These and similar matters of which arithmetic treats are rational and are common to all those who possess reason. There is no man who does not know something about them, for they are necessary for acquiring knowledge. Thus, they use them as examples, as in 'one is half of two'. There is no doubt that these propositions are universal and must be accepted: they can by no means be contradicted.

79. Such are the principles of their philosophy which Pythagoras laid down. They used to call his followers those who adhere to [the

On this see tard, pars. 15, n. 1, and 61, n. 4, above.

<sup>&</sup>lt;sup>4</sup> Continuous quantity, whose parts form a single continuum, is either spatial or temporal. Spatial quantity may be one-dimensional (a line), two-dimensional (a surface), or three-dimensional (volume). Temporal quantity, however, is undimensional and is constituted of the series of the past, present, and future. As opposed to continuous quantity, discrete quantity is represented by integral numbers (1, 2, 3, 4, etc.). See Ibn Sīnā, Najāt, 116; Ibn Rushd, Talkhīs Mantiq Aristū: al-Maqūlāt, i. 29 ff. (English trans., 45 ff.); Jurjānī, Ta'rīfāt, 164, s.v. al-kamm; Sheikh, Dictionary, 109.

doctrine of] number. They thought that abstract numbers exist outside the mind, but Plato and his followers found out that this is erroneous. The latter¹ thought that abstract quiddities, such as the absolute human and absolute horse, are existents outside the mind and that they are pre-existing and eternal. Then Aristotle and his followers found out that this is erroneous. They maintained that these absolute quiddities exist in the external world concomitantly (muqārina) with the existence of individuals.² The later followers of Aristotle adhered to this view, though it too is erroneous. What exists in the external world is never universal; in the external world there are only individuals.³ If it is said: 'The natural universal⁴ exists in the external

79 <sup>1</sup> Grammatically, the subject of this Arabic sentence refers to the followers of Pythagoras. It is clear, however, that this is not what Ibn Taymiyya intended. The doctrine of 'abstract quiddities', such as the 'absolute human' and 'absolute horse', being outside the mind, pre-existing, and eternal, is nothing but the Platonic Ideas.

<sup>2</sup> For the Neoplatonist notions of universals and those of Aristotle, see Aaron, *Theory of Universals*, 4–10; Kneale and Kneale, *Development*, 21. Aristotle held the universal as that which is common to many things, and thus can be predicated of any one of them. The universal then cannot be a primary substance, nor can it exist as do the Platonic Forms. This follows from his view, asserted time and again, that the individual is unique and that 'the substance of each thing is that which is peculiar to it, that which does not belong to anything else; but the universal is common' (*Metaphysica*, 1038<sup>5</sup>9–10). In fact, in the *Metaphysica*, 1071<sup>a</sup>19 ff., Aristotle says that the universals do not exist. The modern commentators do, none the less, attribute a certain degree of realism to Aristotle. It would be worth while to quote the relevant lines from one such commentator:

It might appear...that [in Aristotle] what is thought is completely different from what is.... It might be supposed to follow from this that in thinking we are closed up within a thought-world wholly other than the real world. This, however, is not Aristotle's view, for he holds that though real individuals elude our thought, we do none the less think real qualities as real as the individuals themselves, and these qualities are shared in common by a number of individuals. It is because individuals have such common qualities that we can group and classify them and speak of them as members of species and genera.... The Aristotelian doctrine of the 'common specific form' which gives the universal species and genus a real reference, in spite of the remoteness from thought of the real individual, is thus rooted upon the apprehension of 'the universal attributes of the species' possessed by individuals, and the sciences which deal with the universal are possible only because of this apprehension. The question, however, arises how the individuals do in fact share these common attributes, and there is no satisfactory answer in Aristotle. Is the quality one and the same in many individuals? Or do the qualities in different individuals resemble one another? The answer is not clear (Aaron, Theory of Universals, 9-10).

<sup>3</sup> It is interesting to contrast Ibn Taymiyya's perception of the philosophers' theory of universals with that of Ghazālī, who, with an almost equal force, also attacked their metaphysics. In his *Tahāfut al-Falāsifa*, Ghazālī states:

This is why the philosophers themselves have explicitly stated that the universals exist in the mind, not in real objects. What exists as real objects are individuated

world', this will mean that the universal is in the mind but it also exists in the external world. But if it exists in the external world it can only be a particular, not universal. Its being universal is conditional upon its being in the mind. He who affirms a quiddity which exists neither in the mind nor in the external world is known to be erroneous once a complete concept of his statement is formed. These matters, however, have been expounded elsewhere.<sup>5</sup>

80. What we mean is that valid demonstrations are based on this science, though the soul can neither reach perfection by means of it nor escape punishment or attain happiness. Accordingly, Abu Hamid al-Ghazālī and others maintained that the sciences of these philosophers are either truthful but futile-may God protect us from futile sciences—or false suppositions that are not to be trusted.1 'Indeed, some suppositions are sinful.' By the first, they were referring to the mathematical sciences, and by the second, to their views on metaphysics, astrology, etc. The soul may find pleasure in such sciences, as it does elsewhere. Man finds pleasure in a knowledge of something he has not known before, or in hearing what he has not heard before, provided he is not preoccupied with something more important to him. He may also find pleasure in various kinds of acts which are of the nature of play and entertainment.

81. Furthermore, in its persistence in acquiring the mathematical science, the soul becomes accustomed to sound knowledge, to valid and truthful propositions as well as to valid syllogisms. In this there is rectification for both the mind and the faculty of apprehension; the soul is trained to learn and utter the truth in order to utilize it in the knowledge of that which is higher than mathematics. It is reported

particulars, which are the data of the senses, not of the intellect; but they are the means through which the mind forms a proposition abstracted from matter. Hence, coloredness is an individual proposition in the mind independent of that of blackness and whiteness. It is inconceivable that in existence there is a color that is neither black nor white, etc., and that we can have in the mind a concept of color without a specific color.

See Ghazāli, Tahāfut, 86-7 (English trans., 51). See also idem, Maqāsid, 174 ff.; and Marmura's section in Encyclopaedia Iranica, iii. 75-6, s.v. 'Avicenna'.

Quran, 49: 12.

See Introduction, Part I, Section 3, above. A detailed discussion of the natural universal (kullī tabī'ī) may be found in Izutsu, 'The Problem of Quiddity and Natural Universal', 131-77.

<sup>&</sup>lt;sup>5</sup> See e.g. al-Radd, passim; Muwāfaqat Sahīh al-Manqūl, passim.

<sup>80 1</sup> Ghazāli, Munqidh, 72, 75, and passim. See, however, ibid. 78 and his Tahāfut, 44-5, where Ghazālī approves of logic and mathematics.

that the first thing the early philosophers used to teach their children was the mathematical science. And many of their leaders used to occupy themselves late in their lives with this science. For when they examined their own methods and the methods of their opponents who advocated faulty theology, and could not find any truth in either, they took to the mathematical science. One such leading philosopher who pursued this science was Ibn Wasil. Likewise, many of our later associates occupy themselves in their free time with the sciences of inheritance, arithmetic, algebra, Reduction (muqābala),<sup>2</sup> geometry, etc., because these sciences exhilarate the soul, are sound and untainted with error. It was reported that 'Umar b. al-Khattāb said: 'If you play, practise archery, and if you converse, talk about inheritance.'3 The calculation of the shares of inheritance is a rational science which is based on a revealed principle. There is in it the exercise of the intellect as well as the preservation of the law. But it is not a science that is sought for its own sake, nor does the soul reach perfection by means of it.

82. As is well known from their history, the polytheists used to worship the stars, consecrate temples to them, and invoke them in various ways. Also well known are the books written according to their own methods about polytheistic creeds, about magic and the invocation of the stars, as well as about the incantations and charms by means of which they glorified Satan and his sentries. By means of polytheism and magic, Satan used to seduce them through things which attracted them to such polytheism and magic. They observed the stars in order to know their dimensions, the scope of their movement, and the relations amongst them; this they did with the

<sup>81 1</sup> Muhammad b. Sālim b. Nasr Allah Ibn Wāsil Abu Abd Allāh al-Māzim (d. 697/1297), a logician and geometer, and a jurist of the Shāfi'ī school. *Encyclopaedia of Islam*<sup>2</sup>, iii. 967, s.v. 'Ibn Wāṣil' (by Gamal el-Din el-Shayyal); Brockelmann, *Geschichte*, i. 323, suppl. i. 555.

<sup>&</sup>lt;sup>2</sup> 'In mathematical language [the science of Reduction] is employed to express the comparison between positive and negative terms in a compound quantity, and the reduction subsequent to such comparison . . . When applied to equations, it signifies to take away such quantities as are the same and equal on both sides.' See Fr. Rosen's commentary on the term muqābala and the reasons for translating it as 'Reduction' in The Algebra of Mohammed Ben Musa (pp. 179–80), being an edition and translation of Khuwārizmi's Kitāb al-Jabr wal-Muqābala. See also Souissi, La Langue des mathematiques, 274. However, this science seems to have been heavily employed in solving difficult cases in the law of inheritance. See Khuwārizmī, Mafātīh al-'Ulūm, 200–1; Ambouba, Ihyā' al-Jabr, 15–16, 18–19.

<sup>&</sup>lt;sup>3</sup> I was not able to locate 'Umar's statement in the akhbār collections, including Daylamı's Firdaws al-Akhbār.

help of what they saw as relevant for the stars. And since the stars are round, and the calculation of their movement could not be made except by means of geometry and the rules governing straight and curved lines, they studied geometry extensively for this purpose, though also for the purpose of the construction of material life. If geometry had no other goal except the calculation of numbers and quantities, it would not have been worth this endeavour. Some people, however, may find pleasure in attaining that goal, for the sorts of pleasure vary from one individual to another; some find it in chess, backgammon, and gambling and are thus distracted from what is more useful to them.

83. The beginnings of the founding of logic were taken from geometry. They represented logic with figures just like the geometric figures, and they called them 'terms', which are like the terms of these figures; and this they did in order to leap from the sensory to the rational figure. What led them to do so was their weak minds and their inability to reach knowledge except through far-fetched methods. God, the Exalted, has facilitated for Muslims the attainment of knowledge, clear understanding, good deeds, and faith, so that they will excel over all kinds of human beings. Thanks be to God, the Lord of beings.

84. As to the metaphysical science, which they view as being abstracted from matter, both in the mind as well as in the external world, it has become obvious to you that metaphysics has no knowable object in the external world. Rather, metaphysics is the knowledge of universal, absolute matters which cannot exist as universals except in the mind. In these matters there is nothing which bears on the perfection of the soul. If the philosophers had known the Necessary Existent specifically, this knowledge would be of a particular which precludes conceiving the occurrence of plurality in Him. This, however, cannot be proven by means of a syllogism, which they call demonstration. Their demonstration does not prove specific particulars, be it the Necessary Existent or something else. It proves only a universal matter, a matter which does not preclude conceiving the occurrence of plurality in that Existent. But knowledge of the Necessary Existent precludes the occurrence of plurality in Him. And he who cannot conceive that which precludes the occurrence of plurality in the universal is someone who does not know God. He

<sup>84</sup> See Hallaq, 'Ibn Taymiyya on the Existence of God', 50 ff.

who affirms of the Lord only the knowledge of universals—as Ibn Sīnā and his likes do<sup>2</sup>—and thinks that this is the perfection of the Lord, he will also, a fortiori, think it the perfection of the soul. If someone should say: 'The soul apprehends only universals, but the body apprehends particulars', he would be extremely ignorant. These universals, by means of which existent particulars cannot be known, lead to no perfection whatsoever. Indeed, if the soul loves to know universals it is because through them it can apprehend particulars. But should the soul fail to apprehend particulars, it would not be happy.

85. Fourth, we maintain: suppose, as they claim, that the soul reaches perfection by attaining abstract universals; what they uphold concerning their higher science which investigates existence and what is subsidiary to it is not consistent with their claim; for the conception of the meaning of existence alone is such an obvious matter that, in their view, it is in no need of definition because existence is obvious and thus is not sought after. Rather, what is sought after are the components of existence. The division of existence into necessary and possible, substance and accident, cause and effect, eternal and contingent, is more specific than that which is called existence. The mere division of a general matter existing in the mind into parts does not necessarily lead, without knowledge of these parts, to a great universal knowledge higher than the concept of existence.

86. Once the parts are known, there will be no knowledge of a matter which is incapable of transmutation or transformation. The philosophers possess no proof whatsoever that the world has been and will continue to be as it now is. All that they adduce as proof in favour of the constancy (dawām) of the agent, efficiency, time, motion, and what is related to them, proves the eternity and constancy of the species of these things rather than the eternity or constancy of a particular thing. The assertion that these arguments

<sup>&</sup>lt;sup>2</sup> See par. 45, n. 3, above.

<sup>85 &</sup>lt;sup>1</sup> Ghazālī, *Maqāṣid.* 34, 141: 'Undoubtedly, the mind apprehends "existence" by way of forming a concept; however, this concept needs no definition (hadd) or description (rasm), for existence has neither' (p. 141). Existence is a primary concept which occurs in the mind without any reflection (p. 34). See also Rāzī, *Muḥaṣṣal*, 32-3.

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā, Najāt, 236-7, 244; Rāzī, Muhassal, 54-5.

<sup>86 1</sup> See e.g. Ibn Sīnā, Najāt, 288 ff.

<sup>&</sup>lt;sup>2</sup> Such as, for instance, proving that humans are immortal when taken as a species since they procreate, although as individuals they are mortal. Cf. Taylor, *Metaphysics*, 109-10.

prove [the eternity of] this world or part thereof is sheer ignorance and has no foundation. The exception, however, is the non-existence of knowledge about an existent thing other than this world. But the non-existence of knowledge is not knowledge of the non-existent. It is because of such beliefs that these people have no faith in the invisible world which was communicated by the prophets. They do not believe in God, his angels, Books, messengers, nor in resurrection after death. They argue: 'We affirm the intelligible world or that which is intelligible but extra-sensory, and that is the invisible.' This view, espoused by a group of speculative theologians and philosophers, is erroneous and misleading. The intelligibles they affirm belong, upon examination, to matters in the mind, matters that do not exist in particulars.

87. The messengers have reported that what exists in the external world is more perfect and of greater existence than what we can see in this world. How different the two worlds are! As they disbelieve what the messengers reported, they argue that the messengers set out to inform the masses of what they had imagined so that they would benefit by promoting the justice which they had established for these masses. Some of them also argue that 'the messengers know as well as we do that such matters do not exist'. Still others argue that 'the messengers do not know this, but their perfection lies in their practical, not theoretical, faculty'.2 Upon realizing the true nature of their argument the least fervent follower of the messengers will not accept what they uphold. Once he reaches, through rational proofs, the knowledge that nothing of this world can be eternal, and once he understands, through prophetic reports supported by reason, that prior to this world there was another world out of which this world was created, and that the latter will be transformed and there will be resurrection, etc., then he will know that their universal principles are at best inconsistent, and constitute ignorance, not knowledge.

<sup>&</sup>lt;sup>3</sup> See e.g. Badawi, Plotinus apud Arabes, 25 ff., 56 ff., 158 ff.

<sup>87 &</sup>lt;sup>1</sup> Cf. Farābī, Taḥṣīl, 44 (English trans., 47); idem, The Political Regime, 40-1.
<sup>2</sup> Cf. Ibn Sīnā, Najāt, 338 ff.; idem, al-Quwā al-Insāniyya, 216 ff.; Fārābī, Taḥṣīl, 42 (ll. 14-16) (English trans., 46 (ll. 18-20)); Ghazālī, Maqāsid, 382-4, where such claims do not seem to be substantiated, although the degree of perfection in prophethood varies according to the faculties enjoyed by each particular prophet. However, Ibn 'Arabī's distinction between nubuwwat al-tashrī' (legislative prophethood), which is in charge of practical philosophy (hikma 'amaliyya), and walāyā implies, if it does not clearly propose, that the walī is intellectually superior to the prophet. See Fuṣūṣ al-Hikam, 62 ff.

88. Even if we suppose that they are not aware of what the messengers have reported, there is nothing in reason that would necessarily lead to their claims that the universal species in this world are everlasting and eternal, having existed and continuing to do so. The knowledge of such matters is not knowledge of permanent universals. Most of their first philosophy and high wisdom is of this sort. So are the writings of those who followed in their footsteps, such as the authors of al-Mabāhith al-Mashriqiyya, Hikmat al-Ishrāq, 2 Daga iq al-Haqa'iq,3 Rumūz al-Kunūz,4 Kashf al-Haqa'iq,5 and al-Asrār al-Khafiyya fī al-'Ulūm al-'Aqliyya.6 The likes of these have neither supported the philosophers without any qualification, nor totally rid themselves of the trappings of their errors; rather, they have contracted many of their errors and schemes and were able to liberate themselves from only some of their evil. At the same time, they have not done justice to issues the philosophers were right about, and have thus erred because they either misunderstood the intentions of the philosophers or did not know that the philosophers were right on such issues.

89. They have followed Ibn Sinā, who discoursed about issues in metaphysics, prophethood, resurrection, and laws—issues which his predecessors did not discuss and neither their minds nor knowledge could attain. He acquired these views from Muslims, or rather from heretics who affiliated themselves with the Muslims, such as the Ismā'īlīs. He, his family, and their followers were known to Muslims as heretics. On the outside they appear, at best, to believe in the Rāfidī religion, but on the inside they conceal pure heresy. Muslims

<sup>88 &</sup>lt;sup>1</sup> Written by Fakhr al-Dīn al-Rāzī, the work was printed in Haydarabad as al-Mabāḥith al-Mashriqiyya fī 'Ilm al-Ilāhiyyāt wal-Ṭabī'iyyāt. See list of References below.

<sup>&</sup>lt;sup>2</sup> Written by Shihāb al-Dīn al-Suhrawardī. See list of References below.

<sup>&</sup>lt;sup>3</sup> Written by 'Alī b. Muḥammad Sayf al-Dīn al-Āmidī, a Shāfi'ī doctor and an Ash'arī theologian (d. 631/1233). Brockelmann lists the title as *Daqā'iq al-Ḥaqā'iq fī al-Mantiq* (Geschichte, suppl. i. 678).

<sup>&</sup>lt;sup>4</sup> This work is an abridgement by Āmidī of his larger, so far unpublished work Abkār al-Afkār. See list of References below.

<sup>&</sup>lt;sup>5</sup> Written by Athīr al-Dīn Ibn 'Umar al-Abharī (d. 663/1264). See Brockelmann, Geschichte, suppl. i. 843.

<sup>&</sup>lt;sup>6</sup> The author of this work is the Shī'ī Jamal al-Dīn b. 'Alī Ibn Muṭahhar al-Ḥillī (d. 726/1325). See Qā'īnī, Mu'jam Mu'allifī al-Shī'a, 143. Brockelmann lists the title as al-Asrār al-Khafiyya fī al-'Ulūm al-Ilāhiyya (Geschichte, suppl. ii. 209).

<sup>89</sup> ¹ On the Ismā'ilīs, see Laoust, Les Schismes, 140 ff.; Encyclopaedia of Islam², iv. 189-206, s.v. 'Ismā'iliyya' (by W. Madelung). See also par. 93, n. 1, below.

<sup>&</sup>lt;sup>2</sup> For the Rāfidīs, see par. 167, n. 1, below.

have written lengthy as well as short treatises in order to expose their secrets and discredit their pretensions. Muslims also launched a war of words and swords against them, for they are more deserving of this than the Jews and Christians. Suffice it that there is al-Qādī Abu Bakr Muḥammad b. al-Ṭayyib [al-Bāqillānī]'s work Kashf al-Asrār wa-Hatk al-Astār, 3 and the treatises of 'Abd al-Jabbār b. Aḥmad [al-Asadabādī], 4 Abū Ḥamid al-Ghazālī, 5 as well as those of Abu Ishāq [al-Isfarā'inī], 6 Ibn Fūrak, 7 al-Qādī Abū Ya'lā [Ibn al-Farrā'], 8 Shahrastānī, 9 and others too many to enumerate.

- 90. What is meant here is that Ibn Sinā said in his autobiography that his family, his father, and his brother were heretics whom he used to hear discuss the intellect and the soul, and because of this he occupied himself with the study of philosophy. None the less, despite the obvious heresy and inner disbelief of those Muslims with whom he is affiliated, their belief in God is greater than that of the ancient philosophers, such as Aristotle and his followers, whose knowledge of God is surpassed even by the [pre-Islamic] polytheistic Arabs.
- 91. I have discussed what Aristotle himself said concerning the science of metaphysics in the Book Lambda, which is the culmination

<sup>3</sup> Cf. Sezgin, Geschichte, i. 610, where the title is given as Kashf al-Asrār fī al-Radd 'alā al-Bātiniyya. For other works by Bāqillānī in defence of the Sunnī position, see ibid. 609, and Encyclopaedia of Islam², i. 958-9, s.v. 'Al-Bākillānī' (by R. J. McCarthy); Muwāfaqat Sahīh al-Manqūl, i. 91 (on al-Daqā'iq).

<sup>4</sup> In addition to his magnum opus al-Mughnī fī Abwāb al-Tawhīd wal-Adl, 'Abd al-Jabbār wrote Tanzīh al-Qur'ān 'an al-Majā'in and Tathbīt Dalā'il al-Nubuwwa; Sezgin, Geschichte. i. 625. See also Laoust, Les Schismes, 185-6. Another Mu'tazilī, Abū Hāshim al-Jubbā'ī, also wrote a treatise titled Naqd 'alā Aristūjālīs fī al-Kawn wal-Fasād; Brockelmann, Geschichte, suppl. i. 343.

<sup>5</sup> Ghazālī wrote numerous treatises and tracts in refutation of sectarian and other groups, the most important of which are the well-known *Tahāfut al-Falāsifa* and *Fadā'ih al-Bātiniyya*; see Badawī, *Les Œuvres d'al-Ghazālī*, 63 ff., 82 ff. (nos. 18, 22).

See also the list of References below.

<sup>6</sup> Subkī reports that Isfarā'īnī wrote a treatise bearing the title al-Radd 'alā al-Mulhidīn (Tabaqāt, iii. 112).

<sup>7</sup> The literature reveals no specific work in which Ibn Fürak attacked the Ismā'līs or the philosophers. For the polemical works of Ibn Fürak, see Sezgin, Geschichte, i. 611.

8 For the biography and polemical works of Abū Ya'lā Ibn al-Farrā', see Farrā', Tabaqāt, ii. 193-230, esp. 205.

- <sup>9</sup> 'Abd al-Karīm al-Shahrastāni wrote, among other things, two works, *Nihāyat al-Iqdām fī 'Ilm al-Kalām* and *al-Milal wal-Nihal*. See list of References below.
- 90 <sup>1</sup> Cf. Ibn Sīnā's autobiography in Gohlman, *The Life of Ibn Sīnā*, 16-89; Gutas, *Avicenna and the Aristotelian Tradition*, 22-30, 194-8; and section ii in *Encyclopaedia Iranica*, iii. 67-70, s.v. 'Avicenna' (by D. Gutas).
- 91 <sup>1</sup> Aristotle, *Metaphysica*, 1069<sup>a</sup>17-1076<sup>a</sup>5. See the text (Liber XI) as commented upon by Ibn Rushd in *Tafsīr mā ba'd al-Tabī'a*, vol. iv, text 3, pp. 1393 ff. English trans. by Genequand, *Ibn Rushd's Metaphysics*.

of his philosophy, and elsewhere, and have shown some of its errors.<sup>2</sup> Among all the known sects who discoursed about metaphysics erroneously, such as the Jewish and Christian scholars, Muslim religious innovators (ahl al-bida'), and others, there are none more ignorant and further from the knowledge of God than those philosophers. Yes, most of their doctrines about physics are sound, extensive, and detailed; and they have arrived at them through their mental faculties. In these doctrines, they indeed seek the truth and show no obstinacy. But they are extremely ignorant of metaphysics, and whatever little of it they have attained is replete with errors.

92. As Ibn Sīnā was somewhat familiar with the religion of Muslims, and having been taught by heretics and by those who were better than them, such as the Mu'tazilīs and the Rāfidīs, he wished to combine what he learned through reason from the latter with what he had acquired from his predecessors. Among the doctrines he himself fashioned are those concerning prophethood, the secrets of miracles and dreams, as well as some aspects of physics, the Necessary Existent, etc. In the writings of Aristotle and his followers there is no mention of the Necessary Existent nor of the principles which pertain to Him. Instead, they speak of the First Cause and affirm it as a Final Cause of celestial movement, where the heavenly bodies move according to Its model.

93. Ibn Sīnā partially reformed this faulty philosophy so that it found acceptance among thinkers who were versed in the religion of Islam. He demonstrated to them some of its contradictions, and they went on to write about it, each in his own way. None the less, they accepted invalid principles of logic, physics, and metaphysics, and did not understand what falsehoods crept into these principles. This led them astray in the pursuit of sublime matters related to faith and the Quran. They deviated in these matters from true knowledge and faith, and most of their views were based neither on reason nor on

<sup>&</sup>lt;sup>2</sup> If Ibn Taymiyya devoted a special work in refutation of Aristotle's *Book Lambda*, its title has not reached us. However, some of Ibn Taymiyya's criticism of Aristotelian metaphysics may be found in his *Muwāfaqat Sahīh al-Manqūl*, and it may have been the subject of his *Bughyat al-Murtād*. See Brockelmann, *Geschichte*, suppl. ii. 123 (no. 83).

<sup>92 1</sup> On the Rāfidīs, see par. 167, n. 1, below.

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā, De Anima, 169-82; idem, Ithbāt al-Nubuwwāt, 41-61 (English trans. in Lerner and Mahdi, Medieval Political Philosophy, 112-21, 99-103); idem, Najāt, 133 ff., 338 ff.

<sup>&</sup>lt;sup>3</sup> See also the fourteenth and fifteenth discussions in Ibn Rushd, *Tahāfut al-Tahāfut*, 469-93 (English trans., 285-300).

revelation; in rational matters they practised sophistry, and in revealed matters, Karmatianism.<sup>1</sup>

- 94. Our intention here is to note that, even if we suppose that the soul could reach perfection by means of knowledge alone, as they have falsely claimed, the soul possesses two faculties, one cognitive and theoretical and the other voluntary and practical. The soul must reach perfection in the two faculties by means of knowing and worshipping God. The worship of God consists both of loving Him and of submitting to Him. No soul can reach perfection without the worship of God the One and the Only who has no partner. Worship combines knowing, loving, and submitting to Him. For this purpose God sent the messengers and revealed all the divine Books to summon people to His worship alone, He who has no partner.
- 95. The philosophers hold that the religious duties which the messengers commanded were meant to reform the morals of the soul so that it would be prepared for the knowledge through which, they [the philosophers] claim, it attains perfection; or that those duties were meant to reform the family and the city, and that is practical philosophy (hikma 'amaliyya). They hold religious duties to be mere instruments for attaining the knowledge they claim to possess. Therefore, they—together with the heretical Ismā'īlīs and those who have completely or partly subscribed to heresy by affiliating themselves with the Sūfīs, speculative theologians, Shī'īs, and others—hold that those who have attained such knowledge are absolved of these duties.<sup>2</sup>
- 96. The Jahmīs held that faith (*īmān*) is the very knowledge of God.<sup>1</sup> This view is better than that of the philosophers, for taking faith to be the knowledge of God<sup>2</sup> entails knowing His angels, Books, and messengers. They also believe that perfection lies in knowing the Absolute Existence and that which is subsidiary to it.<sup>3</sup> If

<sup>93</sup> ¹ On the Karmatians see Encyclopaedia of Islam², iv. 660-5, s.v. 'Karmatī' (by W. Madelung); Laoust, Les Schismes, 140 ff.; Ibn al-Murtadā, Milal, 22.

<sup>94 1</sup> Ghazālī, Maqāsid, 373-4.

<sup>95 &</sup>lt;sup>1</sup> Ibn Sīnā, Shifā': Madkhal, 12-14; idem, Najāt, 340-3, 326-34; Fārābī, al-Tawti'a, 59.

<sup>&</sup>lt;sup>2</sup> This allegation could not be substantiated in philosophical discourse. See, however, Introduction, Part I, Section 4, and notes therein, above.

<sup>96</sup> On the Jahmis see Shahrastānī, *Milal*, 60-1; Laoust, *Les Schismes*, 49 ff.; *Encyclopaedia of Islam*<sup>2</sup>, ii. 388, s.v. 'Djahmiyya' (by W. M. Watt). On the divisions of the Jahmis see Ibn al-Murtadā, *Milal*, 34.

<sup>&</sup>lt;sup>2</sup> I take the Arabic text to read 'fa'innahu ja'luhu ma'rifata al-Lāhi'. The pronominal suffix in ja'luhu refers to faith.

<sup>&</sup>lt;sup>3</sup> Cf. Ibn Sīnā, Najāt, 235, in conjunction with idem, Aqsām al-'Ulūm, 227.

this matter has a reality in the external world, it will not be a means for the perfection of the soul unless the soul knows its glorified and exalted Creator. These Jahmīs are among the greatest heretics. Indeed, it is reported on the authority of 'Abd Allāh Ibn al-Mubārak<sup>4</sup> and Yūsuf b. Asbāt [al-Shaybānī]<sup>5</sup> that more than one scholar deemed them to stand outside the seventy-two sects.<sup>6</sup> This is also the opinion of a later group of scholars who followed Aḥmad [Ibn Ḥanbal]<sup>7</sup> and others. More than one of the leading scholars, such as Wakī' Ibn al-Jarrāh,<sup>8</sup> Ahmad Ibn Ḥanbal, and others, have charged those who uphold this doctrine with heresy. The latter scholars argued that from this it follows necessarily that Satan, Pharaoh, and the Jews, who know this Existence as much as they know their own children, are believers.

97. The views of the Jahmis are still better than those of the philosophers, for what they held is the basis on which souls reach perfection. But they did not combine knowledge of the soul with its volition, the latter being the foundation of the practical faculty. They held that perfection lies in knowledge itself, even though such knowledge may neither be confirmed by beliefs and deeds nor accompanied by fear, love, glorification, etc., which are among the principles and essentials of faith. The philosophers, on the other hand, are very far from attaining perfection.

98. The intention here is to speak only about the logicians' demonstration. However, we have mentioned some of what they have held [in metaphysics] because of their faulty principles.

99. You ought to know that the obvious falsehoods and contradictions in their doctrines do not necessarily entail their condemnation in the hereafter unless God sent to them a messenger whom they refused to follow. This messenger will make it known that if those to

<sup>&</sup>lt;sup>4</sup> 'Abd Allāh Ibn Mubarak b. Wādih al-Tamīmī al-Marwazī, a traditionist and mystic (d. 181/797). Ibn Qutayba, *Ma'ārif*, 223; Sezgin, *Geschichte*, i. 95.

<sup>&</sup>lt;sup>5</sup> Abū Muḥammad Yūsuf b. Asbāt al-Shaybānī (d. 195/810) was a traditionist whose authority was doubted by some scholars. See 'Asqalānī, *Lisān al-Mīzān*, vi. 317-18.

<sup>317-18.

&</sup>lt;sup>6</sup> Tirmidhī, Sahīh, ii. 107. On the historical significance of the seventy-two sects, see Watt, Formative Period, 2 ff.

<sup>&</sup>lt;sup>7</sup> Ahmad Ibn Hanbal (d. 241/855) is the eponym of the legal-theological school of the Hanbalīs. See *Encyclopaedia of Islam*<sup>2</sup>, i. 272-7, s.v. 'Ahmad B. Hanbal' (by H. Laoust); Farrā', *Tabaqāt*, i. 4-20. For his refutation of the Jahmīs, see his *al-Radd 'alā al-Jahmiyya wal-Zanādiqa*.

<sup>8</sup> Abū Sufyān Wakī' b. Mulayh al-Ru'āsī Ibn al-Jarrāh, a Kufan scholar (d. 197/812 or 198/813). See Sezgin, Geschichte, i. 96-7; Farrā', Tabaqāt, i. 391-2; Ibn Qutayba, Ma'ārif, 221; Ibn al-Nadīm, Fihrist, 317.

whom the messengers were sent with the truth deviate from the messengers' path and follow instead that of the philosophers, they will be condemned in the hereafter. Had the prophets not existed, those people would have been more intelligent than others. But the prophets brought forth the truth, some of which still remains amongst nations, though some was rejected. Even the [pre-Islamic] polytheistic Arabs possessed remnants of the religion of Abraham and were thus better than the polytheistic philosophers who adopted the principles propounded by Aristotle and his likes.

100. Fifth, if what they seek to prove by means of their demonstrative syllogism is the knowledge of possible existents, [then we say that none of these existents embodies that which must necessarily endure in one state eternally and everlastingly. Rather, these existents are susceptible to change and transformation. And whatever [attribute] is reckoned to be a necessary concomitant of the thing it describes, that thing itself does not necessarily endure. Thus knowledge of what is described does not constitute knowledge of the Necessary Existent. In fact, they have no valid proof for the eternity of anything in the world, as we have mentioned elsewhere. The utmost their proofs necessarily show is the constancy of the species of agency, of matter, and of duration.<sup>2</sup> This constancy is possible through the successive existence of one individual of the species after another, provided one upholds that every temporal [existent] that is enacted is preceded by non-existence, as plain reason and authentic revelation attest. For to say that the enacted individual is conjoined with its agent eternally and everlastingly is something which pure reason judges to be an impossibility, whatever its agent is considered to be, particularly if it is one that acts by choice. There are conclusive proofs for establishing this doctrine, but they are not, as we have mentioned elsewhere,<sup>3</sup> the same proofs adduced by men such as Rāzi and the likes of him who fall short of comprehending the principles of knowledge and religion.

101. As for what they hold concerning the simultaneity of the effect with the cause, if they mean by 'cause' that which creates the effect, then their doctrine is invalid if judged by plain reason. This is admitted by all [people of] sound natural intelligence who have not

<sup>3</sup> See Muwāfaqat Sahīh al-Manqūl, passim.

<sup>100 &</sup>lt;sup>1</sup> See Muwāfaqat Sahīḥ al-Manqūl, i. 72-3, 217 ff., 277 ff., 230-7, 241 ff.; ii. 90, 103 ff., 150-5, and passim.

<sup>&</sup>lt;sup>2</sup> For matter (mādda) and duration (mudda) see Rāzī, Muhassal, 57; Tahānawī, Kashshāf, ii. 1327, s.v. mādda; Ibn Sınā, Najāt, 236 ff.

been corrupted by the harmful imitation [of the philosophers]. Since the invalidity of the doctrine of the simultaneity of cause and effect is firmly rooted in such intelligence, the very admission that God is the Creator of all things necessarily entails that anything other than He is created and is preceded by nothingness. And if the createdness is assumed to apply perpetually to one created thing after another, then this will not contradict His being the Creator of all things. Everything other than He is created and preceded by nothingness, and nothing attached to Him is as eternal as He. Indeed, He is the greatest in perfection, liberality, and munificence.

102. However, if something else is meant by 'cause', as in the philosophers' example about the movement of a ring as a result of the movement of the hand, and the emanation of rays from the sun, then this does not belong to the category of the agent at all, but rather to that of the conditioned (mashrūt), which may be simultaneous with the condition (shart). However, it is impossible for the individual effect to be simultaneous with its own agent, though it is not impossible for the latter to create one thing after another. The eternity of the species of creating is like that of movement, and it does not contradict the creation of each part of movement, but in fact requires it necessarily because none of these parts is in itself eternal. This has been the view of all sound-minded people in all nations, even of Aristotle and his followers. Although the latter upheld the eternity of the world, they have affirmed of the world neither a creator nor an efficient cause, but a final cause in imitation of which the celestial sphere moves, for the sphere's movement is voluntary.1

First [Cause] is not the Creator of the world but is rather a final cause to be imitated—is extremely heretical and uninformed, they none the less agree with the rest of sound-minded people that the possible, created [being] is not eternal through the eternity of its cause, as Ibn Sīnā and those who agree with him argue. This is why Ibn Rushd and other philosophers like him who have followed in this matter Aristotle's doctrine and that of other sound-minded people rejected this view. They have shown that Ibn Sīnā's views deviated

<sup>102 1</sup> Cf. par. 92, n. 3, above.

<sup>103 &</sup>lt;sup>1</sup> Cf. Kogan, Averroes and the Metaphysics of Causation, 26. <sup>2</sup> Cf. ibid. 49-51.

from those of his predecessors and of all sound-minded people. His intent was to set up a doctrine which would synthesize the teachings of the speculative theologians and those of his predecessors, so that the possible existent can be made the effect of the Necessary while being as everlasting and eternal as the Necessary. On this he was followed by Suhrawardī of Aleppo, Rāzī, Āmidī, Tūsī, and others.<sup>3</sup>

104. In his Muhassal, al-Rāzı alleged that the view that the created effect is co-eternal with the Necessary Being in [Its] essence was agreed upon by the speculative theologians and philosophers. The theologians, however, argue in favour of creation on the grounds that the Creator has, in their view, a free choice in creating. Both the speculative theologians and the philosophers are wrong. No one among the early theologians and philosophers whose doctrine was transmitted to us-such as Aristotle and his likes-held such a view. But this is the view of Ibn Sīnā and the likes of him. And when the theologians uphold the doctrine of the eternity of what subsists in the Eternal by way of attributes and their like, they do not maintain that these are enacted and caused by an efficient cause. Rather, it is the eternal essence, according to them, that is qualified by these attributes. The essence's attributes are its necessary concomitants whereby the realization of the Necessary as eternally necessary can obtain through His attributes that are His necessary concomitants—and this has been expounded elsewhere. They hold that a possible being which admits of existence as well as nothingness cannot be eternal, irrespective of its agent. Likewise, according to the leading philosophers, the eternal is incapable of becoming nothing, and the possible is precluded from being eternally necessary, whether it is held to be necessary in itself or by means of another. But what Ibn Sīnā and his likes maintained concerning the possible which may be eternal, everlasting, and necessitated by means other than itself—as they have argued concerning the heavenly bodies—has, as we mentioned elsewhere, subjected them, on the issue of contingency, to piercing criticism which they could not rebut. But this is not the place to settle this point. We are merely drawing attention to the fact that their syllogistic demonstration does not lead to universal matters whose permanent existence in possible beings is necessary.

<sup>&</sup>lt;sup>3</sup> Cf. Suhrawardī, *Hikmat al-Ishrāq*, 172 ff.; Rāzi, *Muhasşal*, 55-6. Āmidī (*Abkār*, fols. 204b ff.) does not seem to subscribe to such a doctrine.

<sup>104 1</sup> Rāzi, Muhassal, 55-6.

105. As for the Necessary Existent, blessed and exalted may He be, the syllogism does not prove what is characteristic of Him; rather, it proves a universal matter common to Him as well as to others. According to the logicians, what is proven by categorical syllogism is nothing but a universal, common matter having no bearing upon the Necessary Existent, the Lord of beings, may He be glorified and exalted. Therefore, their demonstration does not lead them to any knowledge of a matter which must be constant—whether it belongs to the Necessary Existent or to possible beings.

106. Since the soul reaches perfection by means of acquiring knowledge which remains concomitant with its object, and since they did not acquire any knowledge which remains concomitant with its object, their means of demonstration has not benefited them in deriving that knowledge by which the soul reaches perfection. Let it not be said then that the knowledge by which the soul reaches perfection obtains only by means of their demonstration. Thus, in proving the existence of God, the method of the prophets—may God bless them—has been to mention His signs  $(\bar{a}y\bar{a}t)$ . The prophets resorted to the a fortiori argument; they used neither the categorical syllogism, whose instances are equal, nor pure analogy. For the Lord has no like, and He cannot be subsumed under a universal whose instances are equal. The unblemished perfection affirmed of others is, a fortiori, affirmed of Him, and the imperfections from which others are free, He, a fortiori, is also free of. This is why the rational, demonstrative inferences mentioned in the Quran are of this type, as is evidenced in the proofs concerning His lordship, divinity, unity, knowledge, power, the possibility of resurrection, and other exalted and sublime quests and divine signs that are the noblest of sciences and the greatest means by which souls reach perfection. Although for the perfection of the soul the perfection of both its knowledge and intention are necessary, the worship of God alone, which encompasses knowing, loving, and submitting to Him, is also necessary.

107. God's methods of proof through signs are abundant in the Quran. The difference between sign and syllogism is that the sign is an indication, that is to say, the indicant that entails the very thing indicated. The latter is not a universal matter common to what is to be proven as well as to other things. The very knowledge of the

<sup>106 &</sup>lt;sup>1</sup> The argument here employs the two forms of the *a fortiori* argument, the *a minori ad maius* and the *a maiori ad minus*.

indicant entails the knowledge of the very thing indicated, just as the sun is the sign of daylight. God, the Exalted, said: 'We have appointed the night and the day as two signs; then We have blotted out the sign of the night, and made the sign of the day to see.' The very knowledge of the sun's rising entails knowledge of the existence of day. The same applies to the prophethood of Muhammad, may God praise him: the knowledge of his very prophethood does not entail a matter common to it and to other things. The very knowledge of the signs of the Lord, the Exalted, also entails knowing His sacred soul, but it does not entail a universal knowledge common to Him and others. The knowledge that the signs entail His sacred soul results from the indicant. For each indicant in existence must entail that which is indicated, and the knowledge that a given particular entails another particular is closer to one's natural intelligence than the knowledge that every particular under a universal proposition entails the conclusion. This is the nature of universal propositions.

108. If the particulars of a universal proposition cannot be known by means of analogy, they cannot be known by any other inference. The concomitance of what is indicated along with the indicant, which is the middle term, must be known. Each instance subsumed under a universal judgement must be known to be concomitant with each instance of the indicant. An example of this is saying:

All A is B All B is C Therefore, all C is A

The necessary conclusion is that every instance of C is concomitant with every instance of C, and every instance of C is concomitant with every instance of C. It is known that knowledge of the concomitance of a particular C to a particular C, and of a particular C to a particular C, and of a particular C to a particular C t

109. It is known that, apart from God, all possible beings entail

<sup>107 1</sup> Quran, 17: 12.

<sup>108 &</sup>lt;sup>1</sup> Cf. Ibn Sīnā, De Anima, 206 ff.; idem, al-Quwā al-Insāniyya, 216; Encyclopaedia Iranica, iii. 74, 83-4, s.v. 'Avicenna' (by M. Marmura and F. Rahman).

the essence of the Lord, may He be exalted; they cannot exist without the existence of the essence of the Lord, exalted and blessed may He be. And if the existence of God also entails universal matters common to Him and to other beings, this is so because His existence entails the existence of that which is necessary to Him. These common universals are consequents of the particular. I mean that what is characteristic of the particular in the common universal is necessary to the particular. The common universal is concomitant with the particular provided that the particular and the Knower, who can conceive the common factor, exist. The Knower, may He be praised, knows matters as they are: He knows what is characteristic of His sacred soul, and knows that universals are universals. Therefore, the existence of the particular entails the existence of the absolute general, just as the existence of a particular man entails the existence of humanity and animality. All that is not God is entailed by His very sacred soul. Nothing that is not He can exist without the existence of His sacred soul. Absolute, universal existence cannot be realized (tahaqquq) in particulars, let alone be the creator and innovator of these particulars.

110. The existence of a particular entails the existence of an absolute corresponding to it. Thus, when the necessary existence is realized, the corresponding absolute existence is also realized, and when the agent of all things is realized, so is the corresponding absolute agent. Likewise, when the everlasting eternal is realized, the corresponding absolute eternal is also realized; when the selfsufficient being is realized, the corresponding absolute self-sufficient is also realized, and when the Lord of all things is realized, the corresponding [absolute] Lord is also realized. As we have already said, when a certain human or animal is realized, the corresponding absolute human or animal is also realized. But that which is absolute can be absolute only in the mind, not in individuals. Thus, if a person knew of the existence of an absolute human or animal, it would not mean that he knew the particular itself. Similarly, if he knew an absolute necessary [being], an absolute agent, or an absolute self-sufficient being, it would not mean that he knew either the Lord of all beings Himself or that which distinguishes Him from others.

<sup>110 &</sup>lt;sup>1</sup> The preceding lines assert Ibn Taymiyya's view that all knowledge, including that of the universals, begins with the particular. It is from the particulars that the universal is abstracted. See pars. 108-9 below, and Introduction, Part I, Section 3, above.

And that is what the signs of God, the Exalted, signify. His signs entail Him individually ('aynihi), and forming a concept of Him individually precludes the occurrence of plurality in Him. All things other than He are a proof of His self, and signs of His existence. He is the antecedent of His very self, and all that which is an antecedent constitutes a proof of its consequent. No possible being can be realized without His very self being realized. All possible beings are entailed by Him; they are a proof and a sign of Him. According to the method of the logicians' syllogism, all possible beings signify an absolute, universal matter which can be realized only in the mind. This is why they could not know through their demonstration what is particular only to the Lord, the Exalted.

III. The a fortiori argument, utilized by our predecessors (salaf) in conformity with the Quran, proves that the unblemished, perfect qualities affirmed of God are more perfect than those qualities they thought to be affirmed of that which is other than Henotwithstanding the disparity between the two which the intellect cannot register. Nor can the intellect register the disparity between the Creator and the created. In fact, if the mind comprehends the limitless disparity between any two creatures, while knowing that the grace bestowed by God upon all creatures is greater than that bestowed by a creature upon another, it will become clear to the mind that what is affirmed of the Lord is, to an incomprehensible extent, greater than all that which is affirmed of all other beings. The a fortiori argument thus leads the mind to what is particular to the Lord, given its knowledge of the genus of that which is so particular. Accordingly, intelligent men are of the opinion that the names attributed both to Him as well as to other beings are used by way of analogical predication (bi-tarīq al-tashkīk)<sup>1</sup>—not by means of

<sup>111</sup> Analogical predication (tashkīk), or simply analogy, means here the ascription of an attribute to things that are intrinsically different from each other. However, such an attribute varies in the strength of its application to each of these things, and it is said to be more evident in the one than it is in the other. The degrees of applicability are in terms either of precedence and priority of the essence or of sheer strength. Although the attribute of existence, for instance, may be applied to both the necessary and the possible beings, it is essentially found in the necessary before it is found in the possible, for the necessary, in so far as the precedence of essence is concerned, is the Principle (mabda') of all beings other than itself. This precedence is essential (dhātī), not diachronic. Ibn Taymiyya goes on to use the brilliant whiteness of snow vis-à-vis the duller whiteness of ivory to illustrate the application of a quality according to its strength. See, under tashkīk, Tahānawī, Kashshāf, i. 780-2; and Āmidī, Mubīn, 50-1. For a useful discussion and critique of analogical predication (or analogy), see Kaufmann, Critique, 183-9.

homonymy (ishtirāk) in form or meaning, where the particulars are equal, but rather by a homonymy in meaning where the particulars are unequal. For example, the term 'whiteness' (and 'blackness')<sup>2</sup> may be used for both the brilliant whiteness of snow and for dull white such as that found in ivory. Such is the case with the term 'existence', which is used for both necessary and possible beings; but existence is more perfect and superior in the necessary being than is the superiority of one white colour over the other. Such disparity in analogically predicated names (asmā mushakkaka) does not preclude the meaning from being originally a universal homonym. In analogically predicated names there must be a meaning which is a universal homonym, albeit such meaning exists solely in the mind.

112. This is the source of division (taqsīm), namely, the division of the universal into its parts, as when it is said: 'That which exists is divided into the necessary and the possible.' This source is the common denominator of all the parts. That the existence of the necessary is more perfect than that of the possible does not preclude the name of existence from being a universal meaning applied to both of them. This applies to the other names and attributes used for both the Creator and the created, such as the names 'living', 'knowing', 'powerful', 'hearing', 'seeing', as well as the attributes of His 'knowledge', 'power', 'mercy', 'approval', 'anger', 'happiness', and other names and attributes the messengers have reported.

113. Scholars have disagreed on this issue. Some, like Abū al-'Abbās al-Nāshi', one of the Mu'tazilī leaders who preceded Abū 'Alī [al-Jubbā'ī], said that these names are used in their real sense (haqīqatan) for the Creator but metaphorically (majāzan) for the created. A group of the Jahmīs, Bāṭinīs, and philosophers held the contrary; namely, that they are used metaphorically for the Creator

<sup>&</sup>lt;sup>2</sup> Here, as well as in *al-Radd*, Ibn Taymiyya presents us with the attributes of 'whiteness' and 'blackness' as two examples of analogical predicates. He does not, however, pursue the latter example any further.

<sup>112 &</sup>lt;sup>1</sup> Taqsım, or qisma, is the division of the whole into its constitutive parts or, here, the universal into its real or mental particulars. The distinction in this last division is made between accidents, not essences. See Tahānawī, Kashshāf, ii. 1222.

<sup>113</sup> Abū al-'Abbās 'Abd Allāh b. Muḥammad al-Nāshi' al-Akbar Ibn al-Shirshīr, a Mu'tazilī who is said to have died in 293/905. He is also reported to have written a number of works in refutation of Greek logic. See Ibn al-Murtadā, *Tabaqāt al-Mu'tazila*, 92-3. See also Introduction, Part II, nn. 139-40, above.

<sup>&</sup>lt;sup>2</sup> On the Jahmīs, see par. 96, n. 1, above; on the Bāṭinīs, see Shahrastānī, *Milal*, 147 ff.; *Encyclopaedia of Islam*<sup>2</sup>, i. 1098-1100, s.v. 'Bāṭiniyya' (by M. G. S. Hudgson).

but in their real sense for created beings.<sup>3</sup> The majority of scholars, however, have maintained that they are used in their real sense for both Creator and created. This is the view of various Mu'tazili, Ash'ari, and Karrāmī thinkers as well as the view of jurists, traditionists, and Sūfīs. It is also the view of the philosophers, though many of these contradict themselves; for while admitting that some of these names—such as 'existent', 'soul', 'essence', 'reality', etc. are used in their real sense [for both Creator and created], they reject others for reasons adduced by those who maintain that none of these names are applicable in their real sense to the Creator. What applies to that which they admitted applies equally to what they rejected.<sup>4</sup> But because of their incompetence they have drawn distinctions between similar things. The denial of the real sense of all these names precludes the existent from being in existence, when it is already known that the existent is divided into the necessary and the possible, the eternal and the contingent, the self-sufficient (ghanī) and that which is not (faqīr), the caused and the uncaused. It is also known that the existence of the possible entails that of the necessary, and the existence of the contingent entails that of the eternal. The existence of that which is not self-sufficient entails the existence of that which is, and the existence of the effected entails the existence of that which is not effected. Thus, while there is a common matter shared by the two existents, the Necessary Existent is distinguished by qualities particular to it. The same applies to all other names.

114. In so far as the common factor is concerned, names designating analogical predication (asmā mushakkaka) are identical with names referring to equal concepts (asmā mutawātia). That is why the early philosophers and others have not assigned a special term for names designating analogical predication, for the term mutawātia

<sup>&</sup>lt;sup>3</sup> A relatively detailed statement concerning the various views on the names and attributes of God may be found in Rāzī, *Muhassal*, 116-32.

<sup>&</sup>lt;sup>4</sup> That is, what applies to the first group of names, which they took to be attributes in their real sense, also applies to the second group, whose application to God in a real sense they rejected.

<sup>114</sup> A name that is considered *mutawāti*' carries a meaning applicable to more than one object with the same degree of strength. Thus, when the name 'animal' is employed for a man, a horse, a dog, etc., the name applies to all with equal force. According to technical dictionaries reflecting the consensus of later Arabic philosophers, a name that is *mutawāṭi*' refers to the members of a class with equal strength, unlike a *mushakkik*, which applies to class members with varying degrees of strength. See par. 111, n. 1, above, as well as the next note. Āmidī, *Mubīn*, 50, s.v. *mutawāṭi*'; Tahānawī, *Kashshāf*, ii. 1440, s.v. *tawātu*'.

encompasses all such names. Names designating analogical predication are a part (qism min) of the general mutawāṭi'a, but a counterpart (qasīm) of the specific mutawāṭi'a. Therefore, a universal common factor, which is the object of the name 'general mutawāṭi'a', must be established. This factor can be universal only in the mind, as their demonstrative syllogism indicates. Furthermore, it is necessary to establish the inequality signified by names designating analogical predication which are the counterpart of the specific mutawāṭi'a. Such is the signification of the Quranic demonstrative inferences which are a fortiori arguments. The characteristic of the Lord that distinguishes Him from others must thus be established. This characteristic, whose affirmation entails the affirmation of His soul, is signified by His signs, may He be glorified; it cannot be established by means of a syllogism, be it demonstrative or not.

115. From the foregoing it is obvious that their demonstrative syllogism cannot lead to the desired knowledge of beings and of their Creator—a knowledge through which the soul reaches perfection. How less tenable it is to say that no conclusion can be reached except by means of syllogism!

116. This is a broad subject. However, the intention here is to draw attention to the invalidity of their negative proposition, namely, that no acquired knowledge may be attained except by means of their demonstration. They have not been content with this categorical negation which they have stubbornly insisted on, but they have also reduced knowledge to narrow paths that can lead only to futile results. They have claimed that arriving at the knowledge of God, of His prophets and saints, occurs by means of a syllogism which contains a middle term. Such was the view of Ibn Sīnā and his followers, who, in holding this view, were still better than their predecessors who rejected the knowledge of God and His prophets

<sup>&</sup>lt;sup>2</sup> Thus, according to Ibn Taymiyya the appellation *mutawāti'a* represents a broad concept under which there are subsumed two categories, one analogical predication and the other 'specific *mutawāti'a*'. Accordingly, Ibn Taymiyya takes the latter category of the specific *mutawāti*' to mean that which the philosophers commonly designated as *mutawāti*' (as explained in par. 111, n. 1, above).

<sup>116</sup> In his argument for the existence of God Ibn Sīnā does not employ the syllogism in which the middle term is the cause of the presence of the major term in the minor, but instead resorts to another syllogism in which the middle term is the effect of the presence of the major in the minor. See Davidson, *Proofs*, 281-310, esp. 298-304, and Marmura's section on Avicenna in *Encyclopaedia Iranica*, iii. 73-9, esp. 76-8. For Ibn Taymiyya's own arguments for the existence of God see my 'Ibn Taymiyya on the Existence of God', 53 ff.

and who were most ignorant about the Lord of beings, about His prophets and His Books. Although Ibn Sīnā is distinguished over those philosophers in both knowledge and intellect,<sup>2</sup> he none the less followed their logical method in deciding this issue. And although those who adopted this method are more knowledgeable and more intelligent than their predecessors, they remain more erroneous and more ignorant than the Jews and Christians, for these believe in the Necessary Existent and His attributes, whereas those misguided [philosophers] do not, because of the arrogance and vanity stored in their hearts. They are the followers of Pharaoh and his likes, and this is why you find them either antagonistic to or critical of Moses and of those like him who adhere to religion and revealed law.

117. God, the Exalted, said: 'Those who dispute concerning the signs of God, without a warrant having come unto them, in their hearts is only pride that they shall never attain.' He also said: 'Those who dispute concerning the signs of God, without a warrant having come unto them], very hateful is that in the sight of God and the believers; so God sets a seal on every heart proud, arrogant.'2 He also said: 'So, when their messengers brought them the clear signs, they rejoiced in what knowledge they had. And that which they were wont to mock befell them. Then when they saw Our might, they said: "We believe in God alone, and we disbelieve in what we are associating with Him." But when they saw Our might their belief did not profit them—the wont of God, as in the past, touching His servants; then the unbelievers shall be lost.'3 God spoke at length about the argument of Pharaoh and about those who followed him and followed Namrūd b. Kan'ān4 and their likes from amongst the leaders of heresy and error. He also spoke at length in a number of places about their dispute with Moses, Abraham, and other messengers of God, may He bless them. God made the House of Abraham the leaders of the faithful who inhabit Paradise, and the House of Pharaoh the leaders of the inhabitants of Hell. God, the Exalted, said: 'And he and his hosts were haughty in the land,

<sup>&</sup>lt;sup>2</sup> See Ibn Taymiyya, Muwāfaqat Sahīh al-Manqūl, ii. 255.

<sup>117 1</sup> Quran, 40: 56.

<sup>&</sup>lt;sup>2</sup> Quran, 40: 35.

<sup>&</sup>lt;sup>3</sup> Quran, 40: 83-5.

<sup>&</sup>lt;sup>4</sup> The Quranic Namrūd is the Nimrod of the Bible, who is seen as the enemy of Abraham. See Quran, 2: 260, 29: 23; *Encyclopaedia of Islam*, iii/2, 842-3, s.v. 'Namrūd' (by Bernard Heller).

wrongfully; and they thought they should not be returned to Us. Therefore We seized him and his hosts, and cast them into the sea; so behold how was the end of the evildoers. And We appointed them leaders, calling to the Fire; and on the Day of Resurrection they shall not be helped; and We pursued them in this world with a curse, and on the Day of Resurrection they shall be among the spurned. And We gave Moses the Book, after that We had destroyed the former generations, to be examples for people . . . Say: "Bring a Book from God that gives better guidance than these, and follow it, if you speak truly." '5 He also said about the House of Abraham: 'And We appointed from amongst them leaders guiding by Our command, when they endured patiently and had sure faith in Our signs.'6

118. What we mean is that the later philosophers who surpass their predecessors in learning think that the knowledge of God and His prophets is acquired by means of demonstrative syllogism. I have refuted them at length elsewhere. My intention here is to draw attention to their invalid assertion that no knowledge may be attained except by means of the demonstration which they have prescribed. As this negative statement is invalid with regard to the knowledge acquired by a human individual, it would be a fortiori invalid concerning the knowledge of the Lord of beings, may He be glorified and exalted, as well as concerning the knowledge of His angels and prophets, may God bless them all.

119. The logicians have also divided the classes of proofs into syllogism, induction, and analogy. They have argued that inferences proceed either from the universal to the particular, or from the particular to the universal, or from one particular to another. They have also expressed this in terms of the specific and the general. They argue: inferences proceed either from the general to the specific, or from the specific to the general, or from one specific to another. They have maintained that the first is a syllogism—by which they mean a categorical syllogism. They assign to syllogism the term qiyās, although many jurists and theologians use this term

<sup>&</sup>lt;sup>5</sup> Quran, 28: 39 ff.

<sup>6</sup> Quran, 32: 24.

<sup>118 &</sup>lt;sup>1</sup> He treated this issue in a number of his treatises; see e.g. Muwāfaqat Sahīh al-Manqūl, ii. 253 ff. and passim; Tawhīd al-Ulūhiyya, 47-50 and passim.

<sup>119 &</sup>lt;sup>1</sup> Ibn Sīnā, *Ishārāt*, i. 415-21 (English trans., 129-30); Ghazālī, *Maqāṣid*, 66; Rāzī, *Lubāb al-Ishārāt*, 30.

for analogy. For the majority of judicious people, however, qiyās encompasses both analogy and syllogism.<sup>2</sup> The logicians also hold that the inference that proceeds from the particular to the universal is induction. When it is complete, it is perfect induction, and it yields certitude. When it is imperfect, it does not lead to certitude. The first involves enumeration of the totality of the particulars, and then formulating [a universal] judgement according to what is found in the particulars. The second involves the enumeration of most of the particulars. For example, a person may say: 'Animals move their lower jaws when they eat, for we have observed them and found them to do so.' Then he is told that crocodiles move their upper jaws.<sup>3</sup>

120. They also hold that the syllogism is divided into the categorical  $(iqtir\bar{a}n\bar{t})^1$  and the conditional  $(istithna\ \bar{t})$ . In the latter, the conclusion or its contradictory is mentioned in actuality (bil-fi'l). In the former, the conclusion follows by the force of entailment (bil-quwwa), as in a syllogism formed of categorical propositions; for example, one may say 'All wines are inebriants', and 'All inebriants are forbidden'. The conditional is formed of hypothetical [propositions], and is of two types. The first is conjunctive[-implicative], as in our statement: 'If the prayer is valid, then the person praying has performed ritual ablution.' The affirmation of the antecedent yields

If his name is Miskawayhi, then he is a Persian His name is Miskawayhi

Then, he is a Persian

The conclusion 'He is a Persian' is stated in the same form in the premisses. See also Rāzī, Tahrīr, 140; Ījī, Sharh al-Ghurra, 202, 223 ff.; Ghazālī, Maqāṣid, 84 ff.

On the scope of juridical qiyās see Hallaq, 'Non-Analogical Arguments'. Ghazālī, Mi'yār, 160-5, esp. 163 for the example about crocodiles. See also Baghdadī, Mu'tabar, i. 199-200.

<sup>120 &</sup>lt;sup>1</sup> Although 'conjunctive syllogism' seems to be a more accurate translation for qiyās iqtirāni than 'categorical syllogism', the term 'categorical' is nevertheless used, since in contradistinction to the istithnā'ī syllogism, the iqtirānī must have two premisses with at least one affirmative universal premiss. It is significant that the expression qiyās hamlī (lit. predicative, categorical) is used as a synonym for iqtirānī. See Ghazāli, Maqāsid, 83.

<sup>&</sup>lt;sup>2</sup> Ibn Sınā, *Ishārāt*, i. 425-7, 428 ff. (English trans., 131-5). The distinction here lies in the form in which the conclusion is found in the premisses. The conclusion 'Socrates is mortal' is not to be expressed in the same manner in the premisses of a categorical syllogism. The conclusion in this syllogism is entailed (*bil-quwwa*) by the premisses. In the conditional hypothetical syllogism, on the other hand, the conclusion is itself expressed in, and constitutes part of, the premisses. For example:

the consequent, but the denial of the consequent leads to the denial of the antecedent.<sup>3</sup>

121. The second is the alternative-disjunctive syllogism. It may be [1] disjunctive (māni'at al-jam' wal-khuluww), as in our statement: 'Number is either even or odd', for evenness and oddness can never coexist in one number: a number must be one or the other. Or [2] exclusive-alternative (māni'at al-jam'), as in our statement: 'This object is either black or white'; that is, blackness and whiteness will never simultaneously exist, although the object may be neither. Or [3] inclusive-alternative (māni'at al-khuluww), in which either the antecedent or the consequent must exist, although both may exist together. Some logicians maintain that the disjunctive is the real conditional syllogism, and that it corresponds to the two contradictories (naqīdayn) in the general and the specific. However, the exclusive-alternative is more specific than the two contradictories, for the contraries (diddayn) cannot both be true, though they may both be false. The contraries are more specific than the contradictories. On the other hand, the inclusive-alternative is more general than the two contradictories.<sup>2</sup> The logicians find it difficult to illustrate this last type by way of examples, unlike the first two, for which there are many.3

This man either travels by sea or he will not drown in it; that is, one of the two must obtain—for he will not drown unless he is in the sea: either he will not drown in the sea because he will not be travelling by sea, or he may travel by sea, thus he may be both travelling and drowning. Examples are many. We say, for instance: this [man] is

<sup>&</sup>lt;sup>3</sup> The former is the *modus ponens* and the latter is the *modus tollens*. See Rāzī, Taḥrīr, 164; Brennan, Handbook, 79-80.

<sup>121 &</sup>lt;sup>1</sup> Ibn Sīnā, Ishārāt, i. 499-503 (English trans., 145-7); Rāzī, Tahrīr, 164; Baghdadī, Mu'tabar, i. 152 ff.; Ghazālī, Maqāsid, 86-7.

<sup>&</sup>lt;sup>2</sup> Contraries (addād; sing. didd) are existential qualities (sifāt wujūdiyya) that may alternate as attributes of a thing, but cannot simultaneously exist in the same thing. The difference between contraries and contradictories lies in the fact that while the said qualities cannot simultaneously exist in both the contraries and contradictories, they may exist in the contradictories but may not do so in the contraries. Existence and non-existence, for instance, are contradictories; a thing cannot exist and not exist simultaneously, but must necessarily be in one state or the other. See Tahānawī, Kashshāf, i. 876, s.v. al-tadādd; Jurjānī, Ta'rīfāt, 120, s.v. diddān.

<sup>876,</sup> s.v. al-tadādd; Jurjānī, Ta'rīfāt, 120, s.v. diddān.

<sup>3</sup> Further on disjunctive syllogisms in the Avicennian tradition, see Maroth, *Ibn Sīnā*, 55-69.

<sup>122 &</sup>lt;sup>1</sup> See an identical example given by Ibn Sīnā in *Najāt*, 86, and *Ishārāt*, i. 502 (English trans., 146).

either alive or he is not knowledgeable, not able, does not hear, see, or speak. If he is alive, then the consequent obtains. If he is not, then these attributes will not exist. However, a living thing may exist without possessing these attributes. Likewise, it may be said: this person has performed ritual ablution, or else he cannot pray. If prayer is not performed, then ritual ablution has not been performed, but if the latter is performed then so is the former; either one of the two [conjuncts] must exist. This is also the case whenever the condition (shart) is absent and the conditioned (mashrūt) exists. The inclusive-alternative occurs whenever the conditioned exists but the condition does not. The condition either exists or it does not exist. When [the conditioned] is absent, the condition will also be absent. Therefore, either the conditioned exists or the condition does not exist.<sup>2</sup>

123. Furthermore, they have divided categorical syllogisms into four figures. The natural figure, in which the middle term is the predicate in the major premiss and the subject in the minor, yields the four conclusions: particular, universal, affirmative, and negative. The second figure, in which the middle term is the predicate in both premisses, yields only a negative conclusion. The third, in which the middle term is a subject in both premisses, yields only a particular conclusion. The fourth figure leads to particular as well as universal negative conclusions. The mind, however, is not inclined to this last figure.<sup>2</sup>

124. In order to demonstrate, among other things, the validity of the second and third figures, they have resorted to inferences by contradictories (naqīd), by conversion (al-'aks al-mustawī), I and by full contraposition ('aks al-naqīd): from the truth of a proposition it necessarily follows that its contradictory is false; that its converse is

<sup>&</sup>lt;sup>2</sup> The inclusive-alternative can also be defined and illustrated in terms of a condition and its consequent. In contradistinction to the disjunctive and exclusive-alternative syllogisms, in the inclusive-alternative both the antecedent (condition) and the consequent (conditioned) may simultaneously exist in one thing. This amounts to saying that since the consequent may exist without the antecedent (i.e. conditioned without the condition), there is another condition (cause) which effects the conditioned, thus rendering the first, stated condition a necessary but not sufficient cause.

 <sup>123</sup> ¹ On the three figures and their moods see Ibn Sīnā, Ishārāt, i. 437-82 (English trans., 134-43); Ibn Abī al-Ṣalt, Taqwīm, 23-44; Rāzī, Tahrīr, 148-53.
 2 On the fourth figure see Rāzī, Taḥrīr, 155-6; Khabīsī, Sharh, 80-2, 86-9.

<sup>124 &</sup>lt;sup>1</sup> The text and the Leiden manuscript have 'aks without including the word mustawi. However, the word is clearly implied here, as attested in the statement that follows in al-Radd, p. 161, 14-18.

true, and that its full contraposition is true. If our statement 'No one among the pilgrims is a heretic' is valid, then our statement that 'No heretic is a pilgrim' is also valid.<sup>2</sup>

125. We maintain that these views of the logicians are either false or unduly protracted, taking the reasoner far afield. They either contain falsehood, which hinders truth, or take the reasoner on a tiresome journey before leading him to the truth, when he can reach the truth through easier methods. Some of our predecessors used to illustrate this by the example of someone who, when asked 'Where is your ear?', would raise his [right] hand very high and pass it around to his left ear when he could have instead pointed directly to one ear or the other. Nothing is better than God's description of His Book: 'Surely this Quran guides to the way that is straightest.' The straightest way to the noblest quests is that which God revealed through His Messenger. The path of these philosophers, being false in certain places, tortuous and prolonged in others, can lead them only to that which will bring upon them the torment of God, not happiness—needless to say, their ways do not lead to the perfection of the human soul.

126. Evidence of their [error] is the baselessness and falsity of their argument which restricts inferences to syllogism, induction, and analogy. Also invalid and false is their claim that a conclusion results from two premisses only, no more and no less. They have argued in favour of confining inferences to these three by saying that an inference proceeds from the universal to the particular, from one particular to the universal, or from one particular to another. The first is syllogism, the second induction, and the third analogy.

127. Our response is that you have not proven inferences to be

<sup>&</sup>lt;sup>2</sup> While the contradictory (naqīd) of a statement is its negation, conversion ('aks almustawī) is the transposition of the subject and predicate terms such that the second statement is validly inferred from the first. For example, 'No man is a rock' may be converted to 'No rock is a man'. On the other hand, full contraposition obtains when the contradictory of the predicate in the proposition becomes the subject, and the contradictory of the subject becomes the predicate. The contraposition of the statement 'All girls are intelligent persons' is 'No non-intelligent persons are non-girls'. See Jurjānī, Ta'rīfāt, 134, 219-20, s.vv. 'aks al-mustawī, aks al-naqīd, and naqīd; Baghdadī, Mu'tabar, i. 117-22; Ghazālī, Mi'yār, 121-9; Rāzī, Taḥrīr, 133-4.

<sup>125 1</sup> Quran, 17: 9.

<sup>126 &</sup>lt;sup>1</sup> Aristotle, Analytica Priora, 42<sup>a</sup>32; Ghazālī, Maqāsid, 67; Rāzī, Tahrīr, 139.

<sup>2</sup> Rāzī, Lubāb al-Ishārāt, 30; cf. Tūsī, Sharh al-Ishārāt, i. 416 f., who distinguishes between types of argument in terms of the subsumptive relation between the premisses in each argument.

restricted to syllogism, induction, and analogy. If by analogy you mean an inference that proceeds from particular to particular, then what you have said is not exhaustive. For there remains an inference which proceeds from one universal to another concomitant universal, corresponding to it in the general as well as in the specific. There is also the inference from one particular to another concomitant particular, wherein the existence of the one entails the existence of the other, and the absence of the one entails the absence of the other. These do not fall under what you have called syllogism, induction, or analogy. These are the signs!

128. An example of such an inference is to deduce the rising of the sun from daylight, and the existence of daylight from the rising of the sun. This is not an inference that proceeds from the universal to the particular. Rather, the inference that from a particular rising of the sun there is a particular daylight is an inference which proceeds from particular to particular. But the inference that from the genus of daylight there follows the genus of the rising of the sun is an inference that proceeds from universal to universal. The inference concerning the direction of the Ka'ba from the position of the stars—such as the North Star, Ursa Minor, and Ursa Major, as well as the Minor Star near the Pole, known to some people as the Pole (qutb)—is one that proceeds from particular to particular. So also is the inference that from the appearance of a star there appears another star parallel to it in latitude; that with the rising of one star another is setting; and yet another is taking a middle position—and other similar inferences upon which people have agreed. God, the Exalted, said: 'And by the stars they are guided.'

129. Inferring times and places on the basis of the location of stars is a matter upon which Arabs, non-Arabs, religionists, and philosophers have agreed. The inference from the appearance of the Pleiades that other stars, to the east and west of them, or to the right and left of them, have appeared, is one that proceeds from particular to particular, because these stars are concomitant. Yet this inference is not analogical. If the judgement is universal, then the inference will proceed from one universal to another, not from universal to particular. In fact, it will proceed from one of the universals to another concomitant universal. He who knows the distances between stars, and knows which of them appears simultaneously with daybreak,

will infer upon observing their appearance how much of the night has lapsed, and how much of it remains. This is an inference which proceeds from one of the concomitants to the other. When one knows the location of mountains and rivers and the direction of the wind, one can infer on their basis the places that are concomitant with them. If concomitance has always existed, and the time of its origination is unknown, that is, it has existed since God created the earth—such as the existence of mountains and great rivers, the Nile, the Euphrates, Sayḥān, Jayḥān, and the sea—then such an inference is coextensive.

as in the case of the Ka'ba, which, may God honour it, [Abraham] al-Khalīl built and which remains glorified, never defeated—one will, accordingly, infer things about it or by means of it. Its corners face the four directions of the earth: the Black Stone faces the east; and opposite to it, facing the west, is the Western corner, known as the Damascene; the Yemenite corner faces the south, and that which is opposite to it is called the Iraqi corner. The Damascene is next to the Iraqi on the western side, and the Iraqi is next to the Damascene on the northern side. The latter faces the [North] Pole. Therefore, one infers the four directions from the location of the Ka'ba, and the location of the Ka'ba from the four directions.

131. Also in the case of that which is not as ancient as the Ka'ba, such as edifices and trees in the land, one infers things through them according to what they are. One may say, for example, that what distinguishes such-and-such a house is that in front of it there is a tree having this or that characteristic. The house and the tree are concomitants for a certain duration. This and similar inferences proceed from one concomitant to the other; they are specific and particular, yet they are not analogical.

132. Muslim thinkers have renounced the logicians' methods and held the indicant to be that which yields a conclusion and leads to what is sought to be proven. Knowledge of the indicant entails knowledge of that which is sought to be proven. When it is subject to sound reasoning, the indicant leads either to certitude or to high probability. These thinkers have disagreed amongst themselves

<sup>129</sup> Sayhān (also known as Sarus) is a river in Turkey that passes through the city of Adana and flows into the Mediterranean south-west of Adana. The location of Jayhān is to the east of Sayhān and it flows into the western side of the Gulf of Alexandretta. Cf. the description of Yāqūt, Mu'jam al-Buldān, ii. 196, iii. 293-4.

concerning the indicant which leads to such probability, whether, terminologically, it is to be called 'indicant' (dalīl) or to be assigned the name 'sign' (amāra). The majority of scholars use 'indicant' for both, although some of the speculative theologians apply the term 'indicant' only to that which yields certitude. 2

133. The governing principle concerning the indicant is that it entails what is indicated. Thus, when the indicant is concomitant with another matter, it is possible to infer that matter by means of it. If both are mutual concomitants, then they can be inferred by means of each other; the reasoner infers what is not known to him from that which is. When concomitance is certain, the conclusion is certain. But if concomitance is presumed—and it may turn out to be suppositious—the indicant will be only probable. An example of apodictic concomitance is the existence of creatures, which signifies the existence of their exalted Creator, of His knowledge, power, will, mercy, and wisdom. The existence of the creatures entails the existence of these qualities, for creatures cannot exist without them; creatures cannot exist without signifying the existence of God. Another example is the proof of the Prophet's message in affirmation of the truthfulness of what he related from God. He could relate from God nothing but the truth, for, as a transmitter, he was infallible, and his message from God could never be subject to error. This indicant together with what it indicates are necessary concomitants, and are never separable under any circumstances. Just like the antecedent, the indicant may be existent or non-existent. By means of either the antecedent or the indicant, one infers the existence or absence [of a thing]. From the affirmation of a thing one infers the negation of its contrary and contradictory; and from the negation of its contradictory one infers that it is affirmed. Likewise, from the affirmation of the antecedent one infers the affirmation of the consequent, and from the negation of the consequent the negation of

<sup>132 &</sup>lt;sup>1</sup> Basrī, *Mu'tamad*, ii. 690, reports that the theologians employ the term *amāra* for both rational and revelational evidence which leads to probability. The jurists, however, use the term for rational, probable evidence. Probable textual evidence, such as the solitary report, is identified as *dalīl* (indicant). But see Tahānawī, *Kashshāf*, i. 71-2, s.v. *amāra*, who maintains that both theologians and jurists consider the *amāra* as probable; see also Jurjānı, *Ta'rīfāt*, 29-30, 93, s.vv. *amāra* and *dalāla*.

<sup>2</sup> Ibn Taymiyya's view does correspond with that of Baṣrī. See preceding note.

the antecedent. Each indicant used in an inference must entail that which it indicates. This [principle] encompasses everything that the logicians have or have not held. That which they call a conditional hypothetical syllogism contains nothing but the inference that from the affirmation of the antecedent the consequent is affirmed, and that from the negation of the consequent the antecedent is negated. Whether this inference is cast in the conditional or the affirmative form, its essence (haqīqa), whatever form it may take, will not change as long as its subject-matter does not change. The issue is one of rational meanings, not verbal forms.

134. Should someone argue: 'If the prayer is valid, then the person praying has performed the ritual ablution; or if the sun has risen, then there is daylight; or if the agent is knowing and powerful, then he is living, etc.', what he is saying is that the validity of prayer requires a valid performance of the ritual ablution, that from the validity of prayer the affirmation of ritual ablution follows, that a person would not be considered to have performed prayer unless he had performed ritual ablution, and that ritual ablution is a prerequisite for the validity of prayer; for if the prerequisite is negated, then that which is contingent upon it is also negated. He is also saying that every person performing prayer must have performed ritual ablution; therefore, he who has not performed ritual ablution has not performed prayer. But such verbal formulations and formulations of meaning encompassed in this inference may be expressed in more ways than one.

135. The stronger the intellectual faculty and its conception are, the richer its expression becomes. But if the intellect and its expressions and concepts are feeble, then the person possessing that intellect will be as if he were the prisoner of his own mind and tongue. Such is the case with the Greek logicians: you find them to be the most limited in knowledge and learning, and the weakest in formulating concepts and clear expressions. This is why intelligent people who follow the path of the logicians when treating of the sciences employ methods that are prolix, compressed, affected, and arbitrary. All they do is to explain the obvious and clarify the intelligible. This may lead them to fall into all kinds of sophistry from which God has saved those who do not follow their path. The logicians are also affected with regard to their definitions: for example, their definition of man as well as their definition of the sun

as a star which rises during daytime. I No person, unless he is most ignorant, would define the sun thus. There is nothing more obvious to people than the sun. If someone does not know what the sun is, it will be explained to him, and this explanation has nothing to do with the definition they have given. Should someone not see the sun because of blindness, he would, a fortiori, not be able to see daylight or the stars, although he would hear enough from people to know what the sun was without resorting to the logicians' method.

136. They admit that the first figure of the categorical syllogism renders superfluous all other figures. Forming a concept of the first figure is instinctive and need not be learned from them. Nor does one need to form a concept of it according to their own methods in order to draw inferences.

137. As to their doctrine that an inference must contain two and only two premisses, <sup>1</sup> it is invalid, both coextensively and coexclusively (tard wa-'aks), <sup>2</sup> on the ground that people differ in their needs concerning the number of premisses. While some people need only one premiss because they know the rest of the premisses, others do not even need an inference to acquire knowledge, for they may be in possession of necessary knowledge (bil-darūra). <sup>3</sup> Some of them may need two premisses while others may need four or more. If someone knows that all inebriants are prohibited, but would like to know whether or not a particular beverage is prohibited, and he does not know whether that beverage is an inebriant, he needs to know only

<sup>135</sup> ¹ See pars. 9, n. 2, and 107 above, and par. 148 below. For other definitions of the sun, see Ghazālī, Mi'yār, 302; Ibn Sīnā, Hudūd, 27 (French trans., 39). Ibn Taymiyya's objection to the definition of 'man' (insān), which I take here to be 'rational animal' (hayawān nātiq; Jurjānī, Ta'rīfāt, 32), is obviously based on his rejection of the five predicables as well as the Aristotelian-Avicennian theory of universals. See further pars. 27-9, 32-9 above.

<sup>137</sup> Ahmadnagarī, Jāmi', iii. 107, s.v. qiyās. Aristotle, Analytica Priora, 25<sup>b</sup>32 ff.; 34<sup>a</sup>15-17; 41<sup>a</sup>6; and par. 140, n. 2, below.

That is, the proposition or the definition that 'an inference must contain two

premisses' is neither exclusive (māni') nor exhaustive (jāmi'); i.e. an inference may consist of a single premiss or three or more premisses. See further par. 15, n. 1, above.

<sup>&</sup>lt;sup>3</sup> Necessary or immediate knowledge ('ilm darūrī) occurs in the mind without any reflection or inference, since the mind cannot but receive such knowledge. For example, when my finger touches a flame, I immediately perceive pain without having, or being able, to think of the means by which the knowledge of pain reached my mind. See Baghdadī, Usul al-Dīn, 8-9; Shīrāzī, Luma', 2-3. Among the sources of immediate knowledge are the five senses and multiply transmitted reports (akhbār mutawātira). On the sense content of tawātur and immediate knowledge, see Hallaq, 'Inductive Corroboration', off.

one premiss, namely, that this particular beverage is an inebriant. If he is told that this beverage is prohibited, he may respond by enquiring into the proof for its prohibition, whereupon the reasoner will answer: the proof is that it is an inebriant. This is all that is needed.

138. Likewise, two persons may disagree on whether or not a certain kind of beverage is an inebriant. People often do enquire about certain beverages, for someone may not know whether or not a particular beverage is an inebriant, but may know that all inebriants are prohibited. If he establishes, by means of a reliable report or other evidence, that a particular beverage is an inebriant, then he will know that it is prohibited. The same applies to all species and particulars whose subsumption under a universal proposition, which has a known judgement, is doubtful. An example in point is the disagreement amongst people whether or not backgammon and chess are forms of gambling, whether the controversial date-wine is or is not an inebriant, whether or not taking vows (nidhr)<sup>2</sup> and taking oaths of divorce  $(tal\bar{a}q)$  and of freeing slaves  $(at\bar{a}q)^3$  are subsumed under God's statement: 'God has ordained for you the absolution of your oaths'; they also disagree on whether the reference in God's statement '... unless he makes remission in whose hand is the marriage tie'5 is to the husband or to the fully qualified guardian (alwali al-mustagill); and other such examples.

139. An inference may require two premisses in the case of a person who does not know that the inebriant, controversial datewine, is prohibited and that this particular beverage is an inebriant. He will not know that it is prohibited unless he first knows that it is an inebriant and that every inebriant is prohibited. He may also know that a particular beverage is an inebriant, and that every inebriant is alcoholic, but he may not know that the Prophet, may God praise him, prohibited alcoholic beverages, because he may

<sup>138 &</sup>lt;sup>1</sup> In this connection see Ibn Taymiyya's tract Risālat Taḥrīm al-Nard wal-Shatranj,

<sup>1-35.

&</sup>lt;sup>2</sup> Nidhr is a religious oath to perform a permissible act (fi'l mubāh) out of piety. See Jurjām, Ta'rīfāt, 215, s.v. nidhr. On the legal classification of acts as permissible, recommended, obligatory, reprehensible, and forbidden, see Schacht, Introduction, 120-1

<sup>&</sup>lt;sup>3</sup> 'Atāq constitutes a language by which a slave is freed without conditions affecting the contract of his manumission or his legal capacity as a freedman. See Tahānawī, Kashshāf, ii. 1011, s.vv. 'itq and 'atāq.

<sup>&</sup>lt;sup>4</sup> Quran, 66: 2.

<sup>&</sup>lt;sup>5</sup> Quran, 2: 237.

have recently converted to Islam or may have been raised among ignoramuses and heretics who doubt such a prohibition. He may know that the Prophet, may God praise him, said: 'All inebriants are prohibited', and may also know that this particular beverage is alcoholic, and that the Prophet prohibited alcoholic beverages, but he may not know that Muhammad is the Messenger of God, or that the Messenger forbade all Muslims to drink these substances. He may think that the Messenger allowed their consumption to some Muslims, including himself. Or he may think that he allowed its consumption for medicinal purposes, etc. It is not sufficient for this person to know that intoxicating wine is categorically prohibited. Rather, he needs to know that it is inebriating, that it is alcoholic, that the Prophet, may God praise him, prohibited all inebriants, that Muhammad is indeed the Messenger of God—so he prohibits what God prohibits—and that he categorically prohibited wine and allowed it neither for medicinal purposes nor for pleasure.

140. Furthermore, what demonstrates the invalidity of confining inferences to two premisses is the logicians' definition of the syllogism—which encompasses the apodictic, rhetorical, dialectical, poetic, and sophistic—namely, that it is an argument<sup>1</sup> formed of statements,<sup>2</sup> or one representing a combination of statements which, if admitted as valid, another statement results therefrom.<sup>3</sup> They argue: 'We have said "of statements" in order to exclude a single proposition which in itself entails the truth of its obverse and the obverse of its contradictory as well as the falsehood of its contradictory; such a proposition does not constitute a syllogism. We have not said "formed of premisses" because we cannot define a premiss qua premiss unless it is a part of the syllogism; if we include it in the definition of the syllogism, the definition will be circular. "4 When a

<sup>140 1</sup> Literally, qawl, i.e. 'statement'.

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā, Najat, 69: 'al-qiyās qawl mu'allaf min aqwāl', that is, qiyās is an argument—or inference—consisting of statements. Note the use of the plural aqwāl, rather than the dual qawlayn; Ishārāt, i. 421-3 (English trans., 130-1). Similarly, Ghazālī, Maqāsid, 67, states: 'wal-qiyās 'ibāra 'an aqāwīl' (aqwāl = aqāwīl). Cf. Aristotle, Analytica Priora, 42<sup>a</sup>32: '... it is clear that a syllogistic conclusion follows from two premisses and not from more than two'.

<sup>&</sup>lt;sup>3</sup> Aristotle, Analytica Priora, 24<sup>b</sup>18; idem, Topica, 100<sup>a</sup>25. Joseph, Introduction,

<sup>&</sup>lt;sup>4</sup> The first part of this passage is a close reproduction of Qutb al-Dīn al-Rāzī, *Tahrīr*, 139. The whole passage seems to be a summary of the sources from which Tahānawī derived his technical definition of qiyās. See his Kashshāf, ii. 1190. See also Ibn 'Alī al-Razī, Sharh al-Ghurra, 83; Ghazālī, Mi'yār, 131; Fakhr al-Dīn al-Rāzī, Lubāb al-Ishārāt, 30-1; Āmidī, Mubīn, 64.

declarative statement is part of a syllogism, they call it a premiss, but if it is the result of a syllogism, they call it a conclusion. 5 When it is detached from a syllogism, they call it a proposition. 6 It is called a proposition, although it may also be called a conclusion or a premiss.<sup>7</sup> The declarative statement is a predicate, but not the subjectpredicate used in the technical vocabulary of the grammarians. The former is more general than the latter. The [grammarians'] subjectpredicate exists only as a nominal sentence, whereas a [logical] proposition may be a nominal as well as a verbal sentence, as, for example, in the statement: 'Zayd has lied, and he who lies deserves to be rebuked.'

141. The point here is that by 'statement'—in their postulate that 'a syllogism is an argument formed of statements'—they meant a proposition which is a complete declarative statement, not an individual word which is a single term, since a syllogism contains three terms (hudūd), the minor, the middle, and the major. It may, for instance, be said: wine, about which a legal ruling has not been established, is an inebriant, and all inebriants are prohibited. Wine, inebriants, and prohibition, each is an individual word which is a term in a syllogism. But this is not what they meant by statement (qawl); as they have explained it, they meant that each proposition (qadiyya) is a statement. I

142. They hold that the syllogism is an argument formed of statements which, once admitted as valid, entail another statement.1 What is entailed is the conclusion; it is a proposition, a predicate, a complete sentence, but not an individual word. This is why they have maintained that a syllogism is a composite postulate (qawlun mu'allafun), and have called the totality of the two propositions an argument.<sup>2</sup> If they assert that a syllogism is formed 'of statements', which are propositions, then what is meant is not only two statements, because the plural refers to two or more—as in God's statement: "... if he has brothers, then to his mother a sixth"—or three or

<sup>&</sup>lt;sup>5</sup> Fakhr al-Dîn al-Rāzî, Lubāb al-Ishārāt, 30-1.

<sup>7</sup> Ghazālī, Mi'yār, 131.

<sup>141</sup> Ibn 'Alī al-Rāzī, Sharh al-Ghurra, 55-7, 83; Baghdadī, Mu'tabar, i. 107-8,

<sup>142 &</sup>lt;sup>1</sup> See par. 140, nn. 2-3, above.

<sup>2</sup> See par. 140, n. 2, above.

<sup>&</sup>lt;sup>3</sup> Quran, 4: 11: 'fa'in kāna lahu ikhwa fa-li-ummihi al-suds'. The share of the mother is usually a third of her deceased son's estate except when he had two or more

more. According to the majority of scholars, the latter is the plural. However, the genus of number may have been meant, and thus the reference would be to two or more, and the plural would not be restricted to two. If they argue: 'A syllogism is formed of statements', thereby meaning the genus of number, then what is meant is two or more. So it is possible for a syllogism to be formed of three or four premisses, and not just two. On the other hand, if they mean the real plural, a syllogism would consist of three premisses or more. As they certainly did not mean this, there remains only the former [alternative].

143. If it is said that they admit of this [alternative] and argue that 'We hold that a syllogism consists of at least two premisses but there may be more', then we reply that this is contrary to what you have recorded in your own books where you admit of only two premisses. They have declared that a syllogism leading to a conclusion, be it categorical or conditional, may not consist of less than or more than two premisses. They have justified this by arguing that the synthesized conclusion contains no more than two parts, the subject and the predicate. If the inference is conjunctive, then each of the conclusion's two parts must correspond to one of the premisses; that is, each part is either a subject or a predicate in the two premisses, but will not be identical with either premiss.1 They maintain: 'The conclusion consists of no more than two parts, and therefore it presupposes no more than two premisses. However, when an inference is conditional, it must contain either a hypothetical or a disjunctive premiss that corresponds to all the parts of the conclusion or to its contradictory. It must also contain a conditional premiss, but there is no need for a third.'2

144. They argue: 'Under a syllogism an additional statement may be joined to the two premisses; it may be either related or unrelated to the syllogism. A statement related to the syllogism serves to facilitate and improve the argument or to elucidate one or both premisses.' They call this a compound syllogism (qiyās murakkab)<sup>1</sup>

brothers (or a son). The plural form *ikhwa* (brothers) is thus taken as two or more, not three or more, as would ordinarily be the case in Arabic. On the shares of the mother see Ibn al-Bazzāz, *al-Jāmi' al-Wajīz*, vi. 453.

<sup>143 &</sup>lt;sup>1</sup> Ibn Sīnā, *Ishārāt*, i. 428 ff. (English trans., 133-4); Ghazālī, *Maqāṣid*, 68; Ijī, *Sharh al-Ghurra*, 199-202.

<sup>&</sup>lt;sup>2</sup> Ījī, Sharh al-Ghurra, 201-2, 224 ff.; Jurjānī, Hāshiya, 140.

<sup>144</sup> ¹ On compound syllogism or sorites see Ibn Sīnā, Najāt, 86-7; Rāzī, Taḥrīr, 164-5; Ghazālī, Maqāsid, 96-9. See also Brennan, Handbook, 76-9, and Introduction, Part I, Section 7, above.

and assert that it 'essentially consists of a number of syllogisms formulated in order to determine a single conclusion. However, the syllogism determining that conclusion is but one of these syllogisms; the rest are put forth for the purpose of elucidating the premisses of the syllogism.' They maintain that some of the premisses in the syllogism may be suppressed because they are assumed to be understood, or in order to conceal the falsehood in the premiss so that it may not be detected should it be stated.

145. They maintain that when a syllogism is cast with its own conclusion in order to elucidate the premisses [of yet another syllogism], it will be called a disjoined syllogism; otherwise, it is conjoined. For a conjoined syllogism, they give the example:<sup>2</sup>

Every man is an animal
Every animal is corporeal
Every corporeal is substance
Therefore, every man is substance

For a disjoined syllogism, they give the example:

Every man is an animal
Every animal is corporeal
Therefore, every man is corporeal

They then say:

Every man is corporeal Every corporeal is substance Therefore, every man is substance<sup>3</sup>

146. We reply to them: as it is [formally] stated, the conclusion consists of no more than two parts. But in the mind the conclusion consists of one thing, not two: that is, the affirmation or denial of the judgemental relation; or, if you will, the affirmation or denial of an

<sup>&</sup>lt;sup>2</sup> Ibn Sīnā, Najāt, 86-7. allows for inductive and analogical arguments as a subsidiary part of the sorites (qiyās murakkab), whose function it is to explicate the two premisses of the main, categorical syllogism. See also Baghdādī, Mu'tabar, i. 161 ff.

<sup>&</sup>lt;sup>3</sup> The reference in this sentence is to the categorical, not the compound syllogism. On the omission and addition of premisses in the syllogism, see Ghazălī, *Mi'yār*, 177-81.

<sup>145 1</sup> Baghdadī, Mu'tabar, i. 162-4; Ghazālī, Mi'yār, 180.

Almost identical examples are afforded by Ghazālī, Mi'yār, 180.

<sup>&</sup>lt;sup>3</sup> The Arabic text is confused here, and the syllogism as stated makes no sense. Our reading is 'kull insān jism wa-kull jism jawhar, fa-yalzam minhumā...'.

attribute of a thing; or, if you will, the affirmation or denial of the relation of the predicate to the subject, or similar expressions which point to a single meaning intended by the proposition. If the conclusion is that wine is or is not prohibited, or that man possesses or does not possess sense perception, etc., then what is sought is the affirmation or denial of the wine's prohibition or of man's possessing sense perception. When a premiss bears a relation to that which is to be proven, then what is sought after will be attained. The statement 'wine is an alcoholic beverage' bears a relation to the conclusion; so does the statement 'man is an animal'. If one knows that all alcoholic beverages are prohibited but has doubts whether or not the controversial wine is identified as an alcoholic beverage by the Lawgiver, and if it is said that wine is prohibited because it was established in the Sahih that the Prophet, may God praise him, said: 'All inebriants are alcoholic', then the proposition—namely, our statement 'The Prophet, may God praise him, said: "All inebriants are alcoholic" 'results in the prohibition of wine, although his statement itself encompasses an additional proposition. But this inference presupposes certain premisses in the mind of the hearer; namely, that what has been authenticated by the traditionists necessitates the belief that the Prophet, may God praise him, has said this, and that what the Prophet has prohibited is forbidden, etc. If we needed to mention all that upon which knowledge [of the conclusion] depends, even though it may be known, the premisses would exceed two, if not ten.

147. If one is to follow their lead, then any person who reasons on the basis of a statement from the Prophet, God praise him, must say: 'The Prophet forbade such-and-such, and what he forbade is prohibited, and therefore, such-and-such is prohibited.' Or he must say: 'The Prophet made such-and-such an obligation, and whatever the Prophet renders as obligatory must be so, and therefore, such-and-such is obligatory.' If one is to prove the prohibition against marrying one's own mother or daughters, one need say: 'God has forbidden this in the Quran, and whatever God forbade is prohibited.' Likewise, if one is to prove on the basis of God's statement 'It is the duty of all men towards God to come to the House as pilgrims' that prayer,

<sup>146</sup> I It is not clear to which of the two Sahihs Ibn Taymiyya is referring. However, the hadith appears in both; see par. 52, n. 3, above.

<sup>147</sup> See Quran, 4: 23.

Quran, 3: 97.

payment of alms-tax, and pilgrimage are obligatory, then one must maintain that in His Book God made pilgrimage obligatory, and whatever God makes an obligation is obligatory. Intelligent people consider such statements to be faltering, stammering, and superfluous, explaining the obvious.

148. Such prolixities in their inferences are useless and resemble their overextended discourse about definitions; for example, they define the sun as a star which rises during the daytime. 1 Such statements are nothing but a waste of time; they are tiresome for the mind and replete with gibberish. Those who adopt their definitions and demonstrations remain in disagreement amongst themselves concerning matters apprehended by means other than their definitions. They are also in disagreement concerning the demonstration of matters which do not require their demonstration.

149. They also maintain: 'The conclusion consists of no more than two parts, and therefore it presupposes no more than two premisses.'1 We reply: if you mean that the conclusion consists of no more than two individual terms, this will not be true, for it may be expressed by means of several terms. For example, if someone is unsure whether wine is prohibited by revelation, or permitted by either revelation or analogy, he may be told that 'revelation prohibits wine'. The conclusion here has three parts. Likewise, if he asks 'Is consensus conclusive evidence?' the answer will be 'Consensus is conclusive evidence'. The conclusion here has three parts. If he asks: 'Is or is not man corporeal, sensible, growing, wilfully moving, and rational?', what is required to be proven here is six parts.<sup>2</sup>

150. On the whole, the subject and predicate constituting a declarative statement may be a sentence composed of two terms, or of several terms if its content encompasses many components; for example, the statement of God, the Exalted: 'And the Outstrippers, the first of the Emigrants and the Helpers, and those who followed

<sup>148 1</sup> See pars. 9, n. 2, and 135, n. 1, above.

<sup>&</sup>lt;sup>1</sup> See pars. 143 n. 1, and 140, nn. 2-3, above.

<sup>149 1</sup> See pars. 143 n. 1, and 140, nn. 2-3, above.

All the editions as well as the Leiden manuscript have it as 'six parts', although only five are enumerated. In light of the second sentence of par. 152, this seems to be a mistake.

<sup>150 1</sup> Arabic reserves two sets of terms for English 'subject'/'predicate'; the first, mubtada'/khabar, is grammatical and the second, mawdu'/mahmul, is logical. Ibn Taymiyya uses both sets here. Since English maintains no such terminological distinction, I have assimilated the translation of the two and rendered them as 'subject and predicate'. See Ibn Tumlūs, Madkhal, 33, and Maimonides, Maqāla, 40.

them in good-doing—God will be well pleased with them and they will be well pleased with Him';<sup>2</sup> or His statement, the Exalted: 'The believers and those who emigrate and struggle for the sake of God—those have hope of God's compassion';<sup>3</sup> and His statement: 'And those who have believed afterwards and emigrated, and struggled with you—they belong to you',<sup>4</sup> as well as other components the grammarians call adjectives, coordinate conjunctions, adverbs of manner, of place, of time, etc.

151. If the proposition encompasses many components, it will then be formed not of two but rather of several words and meanings. But should it be argued that the conclusion consists of only two meanings, which may be expressed in either two or more words, then we say: this is not true, for it may consist of one, two, or several meanings, depending on what the person—i.e. the reasoning thinker and learned dialectician asking the question—seeks to prove. Each of them may seek one, two, or many meanings; and expressing what he seeks to prove may be done in one, two, or more words. If he asks: 'Is wine prohibited?' he will be answered 'Yes'. This single word will suffice to answer him. It would equally suffice to say: 'It is prohibited.'

152. The logicians may argue: 'A proposition may contain within it more than one proposition, as in the example you have mentioned about man.<sup>1</sup> This single proposition contains five propositions which require five conclusions. The propositions contained are: Is or is not man corporeal? Does or does not man possess sense perception? Does or does not man grow? Does or does not man move? Is or is not man rational? And concerning wine, Is it or is it not prohibited? And if it is prohibited is it prohibited on the basis of revelation or analogy?' We answer: if you accept this, that is, if you hold that one may imply plurality, then a single word may encompass the meaning of a proposition. If someone asks 'Is the inebriating wine prohibited?' he may be answered 'Yes'. The word 'yes' implies that what is said is 'It is prohibited'. If he asks 'What is the evidence for its prohibition?' then he will be told: 'It is the prohibition of all inebriants', or that 'all inebriants are prohibited', in addition to the statement of the

<sup>&</sup>lt;sup>2</sup> Quran, 9: 100.

<sup>&</sup>lt;sup>3</sup> Quran, 2: 215.

<sup>&</sup>lt;sup>4</sup> Quran, 8: 75.

<sup>152 1</sup> The example is given in par. 149 above.

Prophet, may God praise him, that 'All inebriants are prohibited',<sup>2</sup> and similar expressions in which evidence appears as an individual word, which is a single part, not a proposition formed of two words, the subject and the predicate. The Prophet's statement 'the prohibition of all inebriants' (tahrīmu kulli muskirin) is a construct (mudāf), and his statement '... anna kulla muskirin ḥarām' ('all inebriants are prohibited') with a fatha on the alif in anna is also singular. For anna and its predicate signify a verbal noun in the singular (masdar mufrad), but inna (with a kasra under the alif) introduces a predicate and thus a complete sentence.<sup>3</sup>

153. One may also argue: the evidence that wine is prohibited is the aforementioned statement of the Prophet—God praise him—or the Quran, or the consensus of the Companions, or a certain Quranic verse or tradition. The evidence may also be the existence of a cause of prohibition without evidence to the contrary; or it may be that this wine shares with grape-wine that which necessitates prohibition; or it may be any similar expression pointing to the evidence through a singular term, not a proposition which is a complete sentence. Furthermore, when this evidence, expressed by means of a singular term, is set forth in detail, it will be expressed through numerous words.

154. Your main argument is that the indicant, namely the syllogism, consists of only two parts—or, if you will, two terms—and that which encompasses terms in excess of two would constitute more than one indicant, because each of the qualifications attached to the terms needs an indicant. We reply: the same applies to the two terms; they are two indicants, not one, for each premiss requires one indicant. It will thus follow that limiting the number of premisses to two is unjustifiably arbitrary. If what is to be proven may be proven by means of a single term, or only by means of two, three, four, or more, then making two terms, no more and no less, the sole standard—and casting what has more than two terms into several inferences when the excess appears in the conclusion, and in the prem-

<sup>2</sup> See par. 52, n. 3, above.

<sup>&</sup>lt;sup>3</sup> In this and the following paragraph Ibn Taymiyya argues that a proposition does not necessarily consist of two terms, a subject and a predicate. As an example he gives the Arabic construct (idāfa), which does not contain a subject and a predicate. It must be noted, however, that the construct tahrīmu kulli muskirin may easily be reformulated so as to consist of a subject and a predicate (e.g. kullu muskirin harām) while keeping intact the original meaning of the proposition.

isses when it appears in the proof, thus yielding several syllogisms—is purely arbitrary. This claim is no better than saying: 'The governing principle concerning a conclusion is that it must be one term, and its indicant one part. If what is to be proven is more than one part, then it should be made into two, three, four, or more conclusions, in accordance with its signification.' This view, assuming it has been held, is better than theirs, on the ground that the term denoting the indicant is singular, and a syllogism is an indicant, thus its meaning must be singular.<sup>1</sup>

measured (qistu) such-and-such by means of such-and-such.' A measurement is effected when one thing is used as a measure. If two or three things are used as measures, there will be two or three measurements, not one; these measurements constitute more than one syllogism. The logicians' view that what exceeds two premisses represents more than one syllogism, while that which encompasses less than two represents only a half, not a complete, syllogism is pure convention and has no rational foundation.<sup>1</sup> This view is similar to their arbitrary distinction between essential and accidental attributes which are inseparable from quiddity and existence.<sup>2</sup>

156. It is clear, therefore, that these logicians have not based what they call definition and demonstration upon an existing reality or upon a rational matter. Rather, they have based it upon mere convention, as in the case of the disagreement among scholars concerning whether the cause is a name for that which necessitates an effect so that in no circumstance does one occur without the other—and thus it is open neither to refutation  $(naq\bar{\iota}d)^1$  nor to particularization  $(takhs\bar{\iota}s)^2$ —or whether the cause is a name for that

<sup>154 1</sup> Cf. Ibn Sınā, Najāt, 94.

<sup>155 &</sup>lt;sup>I</sup> See par. 169, n. 1, below. For the conventional nature of Greek logic, see Introduction, Part I, Section 2, above.

<sup>&</sup>lt;sup>2</sup> For a critique of the distinction between essence (*dhāt*) and inseparable accident (*'aradī lāzim*), see Introduction, Part I, Section 2, and pars. 35-6, 38 above.

<sup>156 &</sup>lt;sup>1</sup> Naqd in the sense found here refers exclusively to the refutation of Coextensiveness (see par. 61, n. 4, above) whereby a certain cause is shown to produce no effect. Tahānawī, Kashshāf, ii. 1310, and Jurjānī, Ta'rīfāt, 219, s.v. naqd; Ibn 'Aqīl, Kitāb al-Jadal, 56 ff.

<sup>&</sup>lt;sup>2</sup> Particularization of the cause represents a qualified form of Refutation (naqd). Whereas in the latter the alleged cause is intrinsically incapable of producing any effect, in the former the cause produces no effect because of an obstacle or an impediment (māni'). See Jurjānī, Ta'rīfāt, 46, s.v. takhsīs al-'illa; Tahānawī, Kashshāf, i. 431, ii. 1310-11, s.vv. takhsīs al-'illa and naqd.

which entails the effect, but which effect may not simultaneously occur because of the absence of a necessary condition or because of an existing impediment (māni'). It is also similar to the convention laid down by dialecticians, some of whom give the name 'indicant' (dalīl) to that which absolutely necessitates what is indicated (madlūl), provided no opposing indicant exists. Others use 'indicant' to mean that which necessitates what is indicated, although the two may not occur simultaneously because of the absence of a necessary condition or because of an existing impediment. Dialecticians also disagree on whether the reasoner must, when discussing the indicant, identify the opposing indicant generally or in detail when possible—or refrain from identifying it at all, or identify it generally but not in detail.

157. These are matters of convention and coinage just like the words that people agree to use in order to express what is in their minds; they are not, as the logicians claim in their logic, self-evident truths that are rationally agreed upon by all nations. Those jurists and dialecticians who disagree on the cause and the indicant are closer to reason than the logicians who claim that proof consists of only two premisses, for this is choosing one number [of premisses] in favour of another on no justifiable grounds. The jurists and theologians have taken into consideration the fixed attributes in the cause and the indicant, attributes that are either complete or sufficient. What the latter have held is closer to truth and reason than the purely arbitrary considerations of the logicians.

158. Accordingly, intelligent and learned men have described their logic as being conventional, laid down by a Greek. Intelligent men find no need for it, nor do they depend on it for the acquisition of knowledge. Moreover, this acquisition does not depend on the expressions used in their language, such as *philosophia*, *sophistike*, analytika, theologia, kategoria, and other terms by which they express their meanings. No one argues that the generality of intelligent people have a need for this language, especially those people whom God has blessed with the knowledge of one of the noblest of languages which comprises the highest degree of eloquence and which elucidates in the briefest and most perfect manner that which the mind conceives.

 $<sup>^3</sup>$  On *māni'* see preceding note and the sources cited therein. 158  $^1$  i.e. Aristotle.

159. This is the argument that Abū Sa'ıd al-Sīrāfī adduced in his celebrated debate with Mattā the philosopher. When Mattā complimented logic and claimed that intelligent people need it, Abū Sa'īd responded that there is no need for it, and that the need is rather for learning the Arabic language; for meanings are instinctive and intellective, and in need of no special convention, while Arabic is needed in order to understand meanings that must be learned. That is why learning the Arabic language—upon which the understanding of the Quran and the traditions depends—is, unlike logic, a religious obligation whenever such obligation can be fulfilled by the individual Muslim.

160. The argument of the more recent scholars that the study of logic is a religious obligation incumbent upon those who are able to undertake it, and that it is one of the conditions which must be met in order to interpret the Law,<sup>I</sup> is indicative of both their ignorance of the Law and the uselessness of logic. The absurdity of this claim is necessarily (idtirāran) known<sup>2</sup> from the religion of Islam: the Companions and those who followed them willingly—the choice of the community—and the leaders of the Muslims, knew what their obligations were and how their knowledge and faith were to be perfected long before Greek logic became known. How then can it be argued that a science not validated by logic cannot be trusted,<sup>3</sup> or

<sup>159</sup> ¹ See the text of the debate in Tawhīdī, al-Imta wal-Mu'ānasa, i. 104-43 (The Eighth Night), and Margoliouth, 'The Discussion between Abū Bishr Mattā and Abū Sa'īd al-Sīrāfī', 92-110 (English trans., 111-29); Elamrani-Jamal, Logique, 61 ff., 149-63. An analysis of the debate may be found in Muhsin Mahdi, 'Language and Logic in Classical Islam', 51-83. For the biography of Abū Bishr Mattā Ibn Yūnus see Qiftī, Tārīkh, 323, and Rescher, Development, 119-22 and passim; for that of Abū Sa'īd al-Sīrāfī, see Ibn al-Nadīm, Fihrist, 93.

<sup>160 &</sup>lt;sup>1</sup> The reference here is to such philosophers as Ibn Rushd who argued that the study of philosophy and logic is decreed by divine law. In fact, according to him, the study of the 'books of ancients' and the art of rational reasoning is a legal obligation incumbent upon Muslims. See his Fasl al-Maqāl, 6, 11, 30 (English trans., 44-5, 48, 63). This attitude comes quite close to the well-known stance of Ghazālī when he declared his mistrust of the religious knowledge and learning of scholars who do not study logic. Ghazālī, Mustasfā, i. 10; cf. idem, Qistās, 15 ff. See also Ibn Hazm, Taqrīb, 231-2; and Goldziher, 'Attitude of Orthodox Islam', 186, where the exegete al-Mursī (died probably in 655/1257) is said to have argued that the Quran contains references to logic, mathematics, medicine, astrology, etc.

<sup>&</sup>lt;sup>2</sup> That is, such knowledge is self-evident and non-inferential. On immediate (darūrī) knowledge, see par. 137, n. 3, above.

<sup>&</sup>lt;sup>3</sup> This is a clear reference to the famous statement of Ghazālī in the opening pages of his *Mustasfā*. See the first note to this paragraph.

that natural intelligence cannot, in most cases, operate correctly without logic?<sup>4</sup>

161. They may argue: 'We are not saying that people need the expressions of the logicians, but they do need the principles by which the sciences are validated.' We respond: there is no doubt that the unknown can be found out only by means of that which is known, and people need to validate what they do not know on the basis of what they do know. This is one of the validating criteria (mīzān) that God revealed when He said: 'God it is who sent down the Book with the truth and the Balance (Mīzān)' and when He also said: 'Indeed, We sent Our messengers with the clear signs, and We sent down with them the Book and the Balance (Mīzān).'2 Such [criteria] exist in this and other religious communities who have never heard of the logic of the Greeks. It is thus established that people do not need the logical principles which the logicians have expressed in their own language; namely, their discourse concerning secondary intelligibles. For the subject of logic is the secondary intelligibles in so far as these lead to the knowledge of that which is unknown: logic investigates the states of secondary intelligibles, which are the relations fixed in quiddities in so far as these relations are absolute such that they make possible the realization (tahsīl) of what is not realizable (mā laysa bi-hāsil), or they may be helpful in doing so in a universal, though not a particular, way.3 They claim that, in examining the genus of the indicant, the logician does the same as the legal theoretician who examines a legal indicant and its degree of strength, distinguishes between legal and non-legal indicants, and examines the strength of indicants in order to give preponderance to the strong over the weak when they stand in opposition. They maintain that a logician examines absolute proofs which are more universal than legal proofs, and distinguishes between proofs and pseudo-proofs. They also claim that the relation of their logic to meanings is

<sup>&</sup>lt;sup>4</sup> This seems to be in response to statements such as those made by Fārābī, *Tahsīl*, 4 (English trans., 14), and Ibn Sīnā, *Najāt*, 43, 99, and less directly by Baghdādī, *Mu'tabar*, i. 7. See also Suhrawardī, *Hikmat al-Ishrāq*, 18.

<sup>161 1</sup> Quran, 42: 17.

<sup>&</sup>lt;sup>2</sup> Quran, 42: 25.

<sup>&</sup>lt;sup>3</sup> The Arabic text here reads as follows: 'wa-hiya al-nisab al-thāniya lil-māhiyyāt min haythu hiya muṭlaqa 'urida lahā in kānat mūṣila'. al-Radd, 179, has the same wording, except 'al-nisab al-thābita' in lieu of 'al-thāniya', which was already anticipated by Nashshār (Jahd, 277), who also found the text incomprehensible and who gave the plausible alternative: 'al-thābita lil-māhiyyāt min haythu hiya mūṣila...'.

the same as the relation of metre to poetry, of commodity-scale to commodity, of a clock to time, of a measuring rod to things measured.<sup>4</sup> The majority of Muslim scholars and other intelligent people have held that this is false. The [philosophers'] logic can distinguish neither between indicants and pseudo-indicants nor between the form and content of proof. Logic is not needed to validate meanings, nor is it fit to be used for this purpose. This is the most fallacious of claims.

162. Our dispute with the logicians must centre around the principles they have posited in logic as well as around their claim that the concepts and judgements which one seeks may be obtained only through these principles. They have premissed their logic upon four claims, two negative and two affirmative: they have claimed that no concept can be formed without the methods they have set forth in logic, and that no judgement can be obtained without the methods they have set forth in logic. These two claims are clearly the most fallacious. They have also maintained that through the methods they have elaborated the concepts of reality which could not previously be formed can now be formed. This too is false. We have already exposed these three claims. Later on, we shall discuss their fourth claim, which is more flagrant than the others; namely, that their demonstration leads to judgemental knowledge ("ilm al-tasdīq).

163. If they maintain that the knowledge of concepts and judgements cannot be reached without logic, they are saying that human intellects have no means of acquiring knowledge except through the definitions and syllogistics they have prescribed. They have also claimed that their definitions and syllogistics lead to the knowledge which humans reach through their intellects; that is, whatever leads to knowledge must conform solely to their methods. They have prescribed a canonical instrument by which the processes of acquiring knowledge are evaluated and their validity or invalidity is determined. Conforming to this instrument safeguards the mind from erring in forming a concept or a judgement.<sup>1</sup>

<sup>&</sup>lt;sup>4</sup> See similar statements in Fārābī, *Tawṭi'a*, 55-6; Ibn Tumlūs, *Madkhal*, 16; Rāzī, *Tahrīr*, 5-6.

<sup>162 &</sup>lt;sup>1</sup> See pars. 6 ff., 17 ff., 41 ff. above.
<sup>2</sup> See pars. 230 ff. below.

<sup>163 &</sup>lt;sup>1</sup> Ibn Sīnā, *Ishārāt*, i. 167 (English trans., 47); Fārābi, *Tawti'a*, 55; Baghdādī, *Mu'tabar*, i. 7; Ghazālī, *Maqāsid*, 36; Ibn Tumlūs, *Madkhal*, 16; Jurjānī, *Ta'rīfāt*, 208, s.v. mantia.

164. This is the summary of what they have maintained. All these claims of theirs are false, whether they are formulated in the negative or the affirmative. The methods of others which they have rejected are not all false, nor are all the methods they have adopted true, as they have claimed, though some are true, just as some of the others' methods are false. They, as well as others, must be right about something they hold. Jews and Christians hold, in relation to the totality of their own doctrines, more truthful doctrines than these philosophers do. Even the polytheistic Arab idolaters and their likes held relatively more truthful doctrines than those found in the entirety of their philosophy, be it the theoretical or the practical, which treats of ethics, society, and polity.

165. For this reason the Greeks were polytheists and worshippers of stars and idols, much worse than the Jews and Christians even after the latter had abrogated and distorted their own Scripture. Had it not been for God, who was gracious enough to send to them the religion of Christ and thus guide them to truth and monotheism through his religion before its abrogation and corruption, they would have remained like their fellow polytheists. But when Christianity was altered, the Greeks came to believe in a religion that was a combination of belief and heresy; one part of it was true, the other false. This, however, is still better than the religion of their predecessors.

166. Our discussion here aims at exposing the errors of those philosophers who base<sup>I</sup> their erroneous doctrines upon the mistakes of others. They cling to lies in transmitted reports, and to ignorance in rational matters. For example, they say that Aristotle was the minister of the Two-Horned one who is mentioned in the Quran.<sup>2</sup> They have claimed this because they have heard that Aristotle was the minister of Alexander, and the Two-Horned one was also called Alexander.<sup>3</sup> But this is an expression of their ignorance, for Alexander, under whom Aristotle served, was the son of Philip the Macedonian who is mentioned in the annals of the Greeks (al-Rūm), which are

<sup>166</sup> The Rabat edition reads: 'al-ladhīna yabnūna'; but the Leiden manuscript (fol. 155a, l. 9) has it as 'al-ladhīna yantahūna ma'', meaning, in general terms, that the philosophers end up multiplying their errors by adopting the erroneous doctrines of others. Both readings, however, make sense.

<sup>&</sup>lt;sup>2</sup> See Quran, 18: 83, 86, 94, where the Two-Horned is positively depicted as representing the forces of Good.

<sup>&</sup>lt;sup>3</sup> On Aristotle's relationship with Alexander the Great see Russell, *History*, 173-4. See also Langer, *Encyclopedia of World History*, 64-7.

known to the Jews and Christians. This Alexander went to Jerusalem but did not, according to those who know his history, reach Sudd.<sup>4</sup> He was a polytheist who worshipped idols. So were Aristotle and his folk. But the Two-Horned one was a monotheist and believed in God, and lived before Alexander the son of Philip. Those who call the latter Alexander call him Alexander the son of Darius [as well].<sup>5</sup>

167. Thus, the views of those philosophers became widespread among people lacking in reason and religion, such as the Karmatians and the Bāṭinis, whose doctrine combines the philosophy of the Greeks with the religion of the Magians, although outwardly they adhere to the religion of Rafd. Of the same stock are the ignorant mystics and speculative theologians. Being heretics and hypocrites, they find fertile ground in an ignorant (jāhiliyya) environment which is far from knowledge and faith. They also find wide acceptance among hypocritical heretics as well as among the polytheistic Turks. They always find acceptance among the heretical and hypocritical enemies of God and of His Messenger.

168. Now, our discussion will revolve around their doctrine—whose weakness is known—that in every inference there must be no more and no less than two premisses. Since they have realized that an inference may need more than two premisses or be restricted to one, they have argued that under a syllogism there may be subsumed an additional statement, namely, a third premiss over and above the first two. The addition may be for an invalid reason or it may be for a valid one, such as for the purpose of clarifying the two premisses. They call this a compound syllogism (qiyās murakkab), and argue that it encompasses a number of syllogisms constructed in order to reach more than one conclusion, although in themselves these syllogisms lead to only one conclusion. They say: 'One of the two premisses may be suppressed because it is well known or even for no

<sup>&</sup>lt;sup>4</sup> Cf. Mufassal al-l'tiqād, 160-1. Sudd is said to be located near Rayy. On the alleged conversation between Sudd's inhabitants and Alexander the Great, see Yāqūt, Mu'jam al-Buldān, iii. 197 ff. In Naqd al-Mantiq, 132, Alexander the son of Philip is reported to have reached the 'lands of the Persians' but not the 'lands of the Turks'. More important, al-Sudd in Jahd becomes al-sadd (dam) in Naqd al-Mantiq, and this dam is reported not to have been built by the son of Philip.

<sup>&</sup>lt;sup>5</sup> See, in general, Maqdisī, al-Bad' wal-Ta'rīkh, iii. 152 ff.; Ibn al-Nadīm, Fihrist, 333

<sup>167 &</sup>lt;sup>1</sup> The Rāfidis, the followers of the 'religion of Rafd', are the Shī'is who rejected (rafadū) the Imamate of Abu Bakr and 'Umar. Further on this sect and its name, see Ibn al-Murtadā, al-Munya, 93 ff.; Shorter Encyclopaedia of Islam, s.v. 'Rāfidites' (by J. H. Kramers).

valid reason at all.' They divide compound syllogisms into disjoined and conjoined types.<sup>1</sup>

169. We respond that this is an acknowledgement on your part that some inferences need more than two premisses and some others only one. You have also held that an inference which is in need of more than two premisses contains in effect a number of syllogisms. We answer you: you claim that the syllogism must encompass at least two premisses; and if it encompasses more than two, it will consist of more than one syllogism, each of which explicates one of the premisses. Instead, you should say: 'What is needed is one premiss; and whatever premiss may be added to it would be added for the purpose of explicating that premiss.' Rationally, this is more tenable, since the predication of a quality upon the thing qualified, of a judgement upon the thing judged, or of a predicate upon a subject,<sup>2</sup> must be by means of a middle which is the indicant. Therefore, one premiss is indispensable, but what is in excess of one premiss may or may not be needed.

170. As to the claim that the two-premiss syllogism is needed in some cases, it is the same as the claim that in some particular cases three premisses are needed while in some others four or five. One number has no priority over another.

be suppressed because it is clear or for the purpose of deceiving [the opponent], the same may be said about suppressing the third or the fourth premiss. When someone argues in favour of a certain issue by adducing one premiss, it may not be sufficient to prove the point; if two or three additional premisses do not suffice then he must adduce still more premisses to the point of sufficiency. Once all the premisses are set forth, those inadmissible will be excluded, and those indefensible discarded, and so on, until the inference is completed. When someone is asked about the evidence concerning the prohibition of a particular beverage, he should say: 'It is prohibited.' If he is asked 'Why?' he should answer: 'Because it is an intoxicating wine.' This

<sup>168 1</sup> For all these arguments see pars. 144-5 and notes therein.

<sup>169 &</sup>lt;sup>1</sup> Rāzī, *Tahrīr*, 164-5. See also Ghazālī, *Maqāsid*, 98 (ll. 5-6), where he strongly implies that the compound syllogism (*qiyās murakkab*), which involves more than two premisses, represents more than one syllogism.

<sup>&</sup>lt;sup>2</sup> Ibn Taymiyya gives the two Arabic sets mubtada'/khabar and mawdū'/mahmūl, both being assimilated here as subject/predicate. See further par. 150, n. 1, above.

<sup>171</sup> Ghazālī, Mi'yār, 177-81.

premiss, if admitted to be true, should suffice if the hearer knows that all intoxicants are prohibited. But if it is argued that this premiss is inadmissible and that this particular beverage is not an intoxicant, one will need to prove its intoxicating quality by means of a trustworthy report or through experimentation with similar beverages. This inference is analogical and yields certitude. For if a certain amount of beverage is sampled and found to be intoxicating, then the remaining amount of that beverage will be known to be intoxicating as well, because it possesses the same attribute. This is also the case with other experiential matters, such as the knowledge that bread satiates, water quenches the thirst, etc. Such matters are based on analogy. In fact, all sensory matters that are known to be universal

are known to be so through analogical inference.

172. Should there be any objection concerning the prohibition of inebriant wines, one would need two premisses; first, that this particular wine is confirmed to be an inebriant, and second, that all inebriants are prohibited. The latter premiss may be confirmed by several indicants, such as the statement of the Prophet, may God praise him: 'All inebriants are prohibited', and 'Every beverage which inebriates is prohibited'. Furthermore, when the Prophet was asked about a beverage made of honey known as bat' as well as about another made of corn and known as mizr, he answered when all-exhaustive knowledge had descended upon him—that 'All inebriants are prohibited'. Now, these traditions are found in the Sahīh; along with multitudes of others, they are known to have been uttered by the Prophet, may God praise him. They go to prove that he prohibited all intoxicants. Should someone say: 'I know that this is an inebriating wine, but I do not agree that wine is prohibited, or that it is entirely prohibited', then he would have to prove the third premiss, and so on.

173. The argument which demonstrates that a single premiss may be sufficient for reaching a conclusion is that the indicant entails the judgement indicated, as we have previously explained. Since the major term entails the middle term and the middle term the minor term, it is then established that the major entails the minor term. For what is concomitant with the antecedent is an antecedent and what is concomitant with the consequent is a consequent. The judgement is a consequent of the indicant; the former can be known to be concomitant with the latter only by means of a middle, for the middle follows the word 'because . . .'. This is the view of the logicians. Ibn Sīnā and others have discussed the qualities  $(sif\bar{a}t)$  which are concomitant with that which is qualified  $(maws\bar{u}f)$  and have argued that some of the qualities are obviously concomitant. They have used this argument to respond to those among their associates who distinguish between what is essential and what is necessary to the quiddity by maintaining that, unlike an essential attribute, a necessary attribute needs a middle. Against Ibn Sīnā they argued that many necessary qualities, whose concomitance  $(luz\bar{u}m)^2$  is so obvious, need no middle; for them, the middle term is the indicant  $(dal\bar{u}l)$ .

174. Some people think that the middle term is that which occupies a middle position between the immediate and mediate necessary [attributes] in the thing itself. This, however, is false, although what is sought after becomes obvious in either case. We say: if the connection between a necessary attribute and its concomitant is selfevident and is in no need of a middle term, then forming a concept of the attribute and its concomitant would be sufficient for knowing that the former is affirmed of the latter. Should they share a middle term whose concomitance with them is obvious, then there would be no need for a second middle. But if one of the two concomitants is not self-evident, then a middle term would be needed. If neither is self-evident, then two middle terms would be needed. In order to express such a middle, a single premiss would be sufficient. Should one enquire about the proof for the prohibition of an inebriating wine, it should be argued that it has been authentically reported that the Prophet, may God praise him, said: 'Every inebriant is alcoholic' or 'Every inebriant is prohibited'. This middle, namely, the statement of the Prophet, may God praise him, does not need a middle term for the believer to know that for him inebriants are prohibited. The conclusion that the wine in question is prohibited because inebriants are prohibited needs no middle term either, for everyone knows that if all inebriants are prohibited, then this particular, controversial wine will also be prohibited. Every believer also knows that whenever

<sup>173 1</sup> Ibn Sīnā, Ishārāt, i. 210 (English trans., 56).

<sup>&</sup>lt;sup>2</sup> That is, such attributes are clearly necessary to quiddity.

<sup>&</sup>lt;sup>3</sup> Tusi, Sharh al-Ishārāt, i. 209 ff.

See Āmidī, Mubīn, 74, and par. 42, n. 2, above.

<sup>174</sup> The meaning of the preceding two sentences, and consequently the whole paragraph, is not completely clear to me. I have, therefore, given a literal translation of it.

the Prophet, may God praise him, prohibits a thing, then that thing becomes prohibited. If it is maintained that the evidence for wine's prohibition is its inebriating quality, and if one knows that a beverage is an inebriant and that all inebriants are prohibited, then one will submit that it is prohibited. But one may forget, or may be ignorant of, its being an inebriant. Also, if one said 'Because it is an alcoholic beverage', one would be admitting that it is an alcoholic beverage, and thus its prohibition would be affirmed. Should one admit its prohibition after one has denied it, then one would realize this after having been ignorant of it or would remember it after having forgotten it, for not all things that one knows can be committed to memory.

175. The logicians have disagreed on whether two premisses are sufficient to yield knowledge of the conclusion or whether a third premiss¹ must be included. The latter view was held by Ibn Sīna and other philosophers. They argued that a person may know that mules do not procreate, but yet he may forget this. Thus, he may see a mule with an inflated abdomen, and may ask: 'Is this mule pregnant or not?' He will be answered: 'Don't you know that this is a mule?' Having answered in the affirmative, he will then be asked: 'Don't you know that mules do not procreate?' He will reply in the affirmative. Ibn Sīnā said: 'Only then will he remember that this mule cannot procreate.'²

176. [Fakhr al-Dīn] al-Rāzī and others disagreed with Ibn Sīnā and have argued that his view is not tenable, the reason being that if a premiss is subsumed under one of the two [original] premisses but is different from the two premisses, then it will constitute a distinct premiss which must entail a conclusion. The manner of joining it to the two [original] premisses would then be the same as that of joining the second to the first. This [process] will ultimately lead to the subsumption of an infinite number of premisses. However, if the premiss is not known to be different from the two [original] premisses, then it cannot be a condition (shart) for yielding a conclusion, because a condition must be different from what is conditioned (mashrūt). Since there is no difference here, it is therefore not a condition. The example of the mule may be valid only when one premiss, the minor or the major, is present in the mind. But when both become present in the mind, we cannot admit of any doubt concerning the conclusion. <sup>1</sup>

<sup>175</sup> Literally: 'a third matter' (amr thalith).

<sup>&</sup>lt;sup>2</sup> The entire paragraph seems to have been taken from Rāzī, Muhassal, 30. 176 <sup>1</sup> This passage is an almost verbatim quotation from Rāzī, Muhassal, 30.

177. I say: the truth of the matter is that this disagreement is the inevitable result of their supposition that only two premisses are needed. However, this supposition is not valid, because what is needed is that by means of which the conclusion is reached, be it one, two, or three premisses. Now, what is forgotten is not known during the time it is forgotten; and only when it is recalled does it become known in actuality. The indicant here is the knowledge that mules do not procreate. This premiss was forgotten, and thus the knowledge resulting from the indicant was not reached. What is forgotten cannot lead to knowledge while it is forgotten; rather, it yields knowledge only upon recollection, for it is then that it can be present in the mind.

178. God, the Exalted, is free of forgetfulness and unawareness, because these would contradict the reality of knowledge. He is also free of slumber and sleep, because these contradict the perfection of life and everlastingness, for sleep is the twin of death. This is why the inhabitants of Paradise neither sleep nor die; they are inspired to glorify God just as each of us is bestowed with a soul.

179. What we mean here is that the purpose of the indicant is to yield knowledge of the conclusion it entails, whether this is called recollection, remembering, or otherwise. When one recalls the indicant's entailment of the conclusion, one will then know that the indicant signifies the conclusion. If this entailment is not obvious, then there may be a need for one, two, three, or more premisses to explicate it. The middle terms may vary from one person to another; what may be taken by one person as a middle term leading to a conclusion may not be taken as such by another. In fact, the latter may arrive at another middle term. The middle is an indicant as well as a means of knowing the connection between the consequent and the antecedent, which are, respectively, the judgement and the thing judged. The judgement is entailed by the thing judged so long as it is the judgement upon the thing judged. The middle terms, which are the indicants, may vary in quality and number in accordance with the gift of intellectual aptitude which God bestows upon individual people. For instance, when the middle term is a true statement, it might be taken differently by two different persons. Similarly, if it were confirmed at the Royal Palace that the crescent moon had appeared, and people dispersed and announced this in the city, then people would know of the appearance of the crescent moon through persons

other than those who first reported the matter. The Quran and the Sunna which people transmitted on the authority of the Messenger reached the community, especially in the second and third centuries, by means of persons other than those who first reported them. The first transmitters had had their own Quran teachers and traditionists, and so had the later transmitters; the first transmitters were the mediators, the middle link between the later transmitters and the utterances and deeds of the Prophet, and they were the ones who led the later transmitters to this knowledge by reporting and teaching it to them. This is also the case concerning knowables that are acquired by means of the intellect or sense perception when someone points or leads to them.

180. As for those who have held that the middle term of the necessary quality is the middle affirmed of the object qualified, they are wrong on several grounds, as we have explained elsewhere. But even if we suppose they were correct, the mental middle is more general than the external middle, just as an indicant is more general than a cause ("illa). Every cause can lead to an effect, but not every indicant can be a cause in the same thing (fi nafs al-amr). Likewise, any middle of a given thing may be made a middle of that thing in the mind, and thus it will become an indicant. But the reverse of this is not tenable, because the indicant entails what is indicated. One can reason on the basis of a cause that entails an effect as well as on the basis of a middle that is concomitant with the antecedent and with which a distant consequent is concomitant.

181. It is therefore obvious that, in either case, the conclusion might be reached through a single premiss if there were no need for other premisses. Sometimes, it is not possible to reach a conclusion except through a number of premisses, in which case they must be known. Confining the inference to no more and no less than two premisses is purely arbitrary. This is why you will not find among intelligent people and authors in various disciplines anyone who restricts his inference to no more and no less than two premisses, and who makes an effort at reducing multiple premisses to two and complementing what falls short of two so that it becomes two. The exceptions, however, are the Greek logicians and their followers. But this is not the case with those who remain faithful to their sound disposition (fitra) and follow in the footsteps of people such as the

Immigrants (Muhājirūn), the Supporters (Anṣār), and those who have followed them voluntarily, and the rest of Muslim scholars and thinkers as well as other religious communities. Nor is it the case with grammarians, physicians, or geometers, for no one has held these views save for those who have followed the logicians and imitated them in the matter of those definitions which consist of genus and specific difference. They have derived no benefit from the knowledge they have acquired from the logicians; they learned only what is false and unnecessary, or harmful and useless, for the logicians' teachings contain much error and are far too protracted.

182. Since an inference may at times need only one premiss, and at others two or more, the method of Muslim thinkers has been such that they set forth those premisses that they need and, unlike those who follow the method of the logicians, do not restrict themselves to two premisses. In their public writings and speeches, in their introspective reasoning as well as in disputations which aim at teaching, guiding, and debating with others, they follow the method I have just mentioned. So do all sorts of intelligent people from other religious communities, except for those who have followed in the footsteps of these logicians.

183. Muslim thinkers continue to denounce the logicians' method and expose its weaknesses, errors, intellectual inadequacy, and inarticulateness. They have shown that such a method is more likely to corrupt the rational and linguistic faculties than to set them straight. They are not willing to adopt it in their own reasoning or in their scholarly disputations, whether these disputations are conducted against a friend or a foe.

184. However, the use of this method has become widespread since the time of Abū Hamid [al-Ghazālī]. He included in the beginning of his work al-Mustasfā an introduction to Greek logic, and alleged that the learning of those who do not know this logic is not to be trusted. In the field of logic, he composed Mi'yār al-'Ilm² and Mihakk al-Nazar, as well as a treatise which he entitled al-Qistās al-Mustaqīm, where he discussed five rules of inference: the three categorical syllogisms, the hypothetical conjunctive, and the hypo-

<sup>183 &</sup>lt;sup>1</sup> See Introduction, Part II, above.

<sup>184 1</sup> See Mustasfā, i. 10.

<sup>&</sup>lt;sup>2</sup> Mi'yār al-'Ilm. See list of References below.

<sup>&</sup>lt;sup>3</sup> See list of References below.

<sup>4</sup> See Qistās, 8 ff., 15 ff., 28 ff., 33 ff., 37 ff., 41 ff.

thetical disjunctive syllogism. He changed the terminology used for these rules and introduced examples he borrowed from the writings of Muslim scholars. In the latter treatise he maintained that he was addressing some of the people of Ta'līm.<sup>5</sup> He also wrote a book on the intentions of the philosophers, and another in which he refuted them and exposed their heresy because they upheld the view of the eternity of the world and denied that God knows particulars and that there will be a Day of Judgement. He has shown in the books he wrote towards the end of his life that the logicians' method is false and leads to uncertainty. He condemned it more than he condemned the method of the speculative theologians. Early on in his life he used to discuss in his works many of the logicians' views, using their terminology and other terminology. But towards the end of his life he went to great lengths to refute them and showed that their method, which is more erroneous than that of the speculative theologians, contains so much ignorance and heresy that it must be censured. He died while studying the compilations of Bukhārī and Muslim. The logic he propounded led him nowhere, and has removed none of the doubt and perplexity which possessed him. To him logic was to no avail.

185. However, because of what he wrote during his lifetime and because of other things, many thinkers began incorporating Greek logic into their fields of study to such an extent that those later thinkers who followed in the footsteps of the logicians thought that this logic was the only existing method and that what the logicians maintained with regard to definition and demonstration was sound and acceptable to intelligent people. Little did these thinkers know that intelligent and learned Muslims and others have denounced and decried it. Muslim thinkers have written many works about logic, and the majority of Muslims denounce it categorically because of what they have observed of its [damaging] effects and attendant consequences, which show the logicians' views to be contrary to sound knowledge and faith, views that led them to all sorts of ignorance, heresy, and error.

186. What we mean here is that the logicians' claim that all inferences depend on only two premisses is untenable. They call a syllogism

<sup>&</sup>lt;sup>5</sup> On the Ta'lımıs, see Shahrastanı, Milal, 147 ff.

<sup>&</sup>lt;sup>6</sup> This he did in the well-known treatise *Tahāfut al-Falāsifa*. See list of References below.

in which one of the premisses is suppressed an enthymeme (qiyās aldamīr). They argue that the premiss may be suppressed owing to its being known or owing to a mistake or for the purpose of falsification.<sup>2</sup> We respond: if the premiss is known, then it is like any other known premiss, and thus suppression of one premiss would have no priority over the suppression of two, three, or four. Should it be possible to claim that in an inference which requires one premiss a second premiss has been suppressed, and that in an inference which requires two premisses a third has been suppressed, etc., then this could go on ad infinitum. Those who reflect on this matter will find what I have said to be true. It is for this reason that men of linguistic eloquence and erudition, who establish demonstrative proofs and conclusive postulates in the most intelligible manner, do not resort in their discourse to the two-premiss [syllogism] propounded by the logicians. Those who follow the latter's method constrict both mind and tongue in the attainment of knowledge. You will find their principles to be like their language—they are so shallow and inadequate that any intelligent person would reject them.

187. Ya'qūb Ibn Isḥāq al-Kindi¹ was the leading philosopher of Islam in his time. (I mean the philosopher who appeared in Islam, for philosophers are not Muslims. A prominent judge in our times was asked: 'Is Ibn Sīnā one of the Muslim philosophers?' Thereupon he replied: 'Islam has no philosophers'.) Ya'qūb [al-Kindī] used to say, among other things, that 'non-existence is the absence of the existence of such-and-such', and similar statements. If some of his statements, like some of the statements of Ibn Sinā and others, are found to be intelligible and eloquent, it is because he learned them from intelligent and eloquent Muslims. Had he otherwise trodden the path of his predecessors and relinquished what he had learned from Muslims, his intellect and language would have been like those of his predecessors.

188. The philosophers' ideas are adopted mostly by those people who cannot comprehend what they say; despite their ignorance and self-deception, these people extol the philosophers. They may under-

<sup>186 &</sup>lt;sup>1</sup> See Āmidi, *Mubīn*, 74; cf. Ibn Rushd, *Three Short Commentaries*, 170 (English trans., 63-4).

<sup>&</sup>lt;sup>2</sup> Ibn Rushd, Talkhīs Mantiq Aristū, i. 358-9; Black, Logic, 157 ff.

<sup>187 &</sup>lt;sup>1</sup> For the biography of Abū Yūsuf Ya'qūb Ibn Ishāq al-Kindī (d. c. 252/866), see Qiftı, *Tārīkh*, 366-78; Ibn al-Nadım, *Fihrist*, 357-65. For a general survey of his philosophy, see Fakhry, *A History of Islamic Philosophy*, 82-112.

stand some, or most, or even all of what the philosophers hold, but do not, at the same time, see the truth of the Prophet's Message, may God praise him; they do not see what sound minds dictate, nor do they realize that what the generality of intelligent people hold contradicts what these philosophers propound. These people, having good faith in these philosophers, were able to understand their doctrine only after much labour and hardship. Only God knows the extent to which they fell into the traps of the philosophers' errors. Then they, like many of the learned men who had initially placed their trust in the philosophers, were finally saved by God and came to see the philosophers' errors. As a result they have withdrawn from the philosophers' ranks and dissociated themselves from them, and have even written in their refutation. Those who have not done so have remained in error. The falsehood of the philosophers' metaphysics is obvious to most people. This is why all Muslim thinkers have declared them heretics.

189. Some people were confused concerning logic and could not perceive its nature and attendant consequences. Nor were they aware of what the generality of scholars have said with regard to the logicians' contradictory views about logic. Although, admittedly, logic contains obvious matters such as the first figure, these people did not realize that what truth there lies in logic can be known without the logicians, who follow unduly prolonged and thorny roads to the attainment of that truth. Here we do not wish to expose their errors concerning what they have affirmed about logic but rather what they have denied—that is, their claims that no acquired knowledge may be reached except by means of their [kind of] demonstration, which is the syllogism.<sup>1</sup>

190. They have held that proofs are of three sorts: syllogism, induction, and analogy. Furthermore, they have claimed that analogy does not yield certainty and that what does lead to certainty is only the syllogism which consists of the premisses they have prescribed. We have explained elsewhere that analogy and the categorical syllogism are coequal and that, if one yields certain or probable knowledge, the other will yield the same knowledge if the subject-matter is one and the same. What is important is the subject-matter, not

<sup>189 1</sup> See par. 41 above and the ensuing critique.

 <sup>190 &</sup>lt;sup>1</sup> Ibn Sīnā, Ishārāt, i. 415, 419 (English trans., 129-30). Ghazālī, Maqāsīd, 66, 90; Rāzī, Sharh al-Ghurra, 81-2.
 <sup>2</sup> See e.g. pars. 216-29, 292 ff.

the form, of the inference. In fact, if the subject-matter is certain, there will be no difference between an inference cast in the form of analogy and one in the form of a syllogism, or between a hypothetical and a disjunctive syllogism. Nor will there be a difference if the argument is expressed in their terminology or in any other terminology, especially if such terminology is better than theirs, more evident to the mind, and pithier.

191. Take the most obvious of examples, such as the statement: 'This is a human, and every human is created, or is an animal, or is capable of perception, or wilfully moves, or is rational', or whatever other attribute necessary to humanity one cares to mention. If you wish, you may cast the inference in the foregoing form. You may also want to say: 'He is a human; therefore, he is created, capable of perception, is an animal, and moves, just like other humans, because they possess in common the attribute of humanity which entails these attributes.' If you will, you may also say: 'This is a human, and humanity entails these attributes; therefore, these attributes are necessary to him.' You may also say: 'If he is a human, then he either possesses these attributes or he does not. And since this last is impossible, then the first remains, because these attributes are necessary to a human, since his existence cannot be imagined without them.'

192. Induction, on the other hand, is certain if it is complete, in which case you will have reached a judgement about the entire class on the basis of what you have found in all the particulars. But this is neither an inference proceeding from particular to universal nor is it one proceeding from specific to general; rather, it is an inference that proceeds from one particular to another particular concomitant with it. For the existence of a judgement concerning each and every particular that falls under a universal necessitates that the judgement be concomitant with that universal. Their argument that such an inference proceeds from particular to universal is false. How could this be the case when the indicant must entail what is indicated? Should it be possible for the indicant to exist without that which is indicated and the latter not to be entailed by the indicant, we would not then know that that indicant is affirmed. We can know that what

<sup>191</sup> This paragraph contains four distinct modes of argument with the same subjectmatter. The first is clearly a categorical syllogism, while the second is an analogy. The third and fourth modes represent, respectively, the hypothetical and disjunctive syllogisms.

is indicated is affirmed along with the indicant if we know that it accompanies the indicant at times, but does not do so at others. If we know this and still argue that what is indicated always accompanies the indicant, then we shall be violating the principle of contradiction.

193. The concomitance we are speaking of here will result in an inference in accordance with the form in which such concomitance occurs. The stronger and more complete and obvious the concomitance, the stronger and more complete and obvious the entailment. Consider, for example, the created beings that signify the Creator, glorified and exalted may He be; each and every creature is concomitant with its Creator, i.e. they can no more exist without the existence of their Creator than without His knowledge, power, will, wisdom, and mercy. Each and every creature signifies all these.

194. If the thing signified is concomitant with the signifier, then the former must certainly be either equal to, or more general than, the latter. The signifier cannot be more general than the thing signified. If the logicians argue that in a syllogism one proceeds from the universal to the particular, then it is not the particular which is the judgement signified. Rather, the particular is that which is characterized and identified as the locus of the judgement. It may be more specific than, or equal to, its indicant, unlike the judgement which is the attribute of the indicant and that which describes it; the judgement can only be equal to, or more general than, its indicant. The judgement is the thing signified which is concomitant with its indicant, and this last is in turn concomitant with that which is characterized and identified.

195. When you say 'Wine is prohibited because it is an alcoholic beverage', its being an alcoholic beverage is the indicant. The latter is concomitant with wine, and prohibition is concomitant with alcoholic beverages. In the syllogism consisting of two premisses, you may say: 'All disputed wines are either intoxicants or alcoholic beverages' and 'All alcoholic beverages are prohibited'. Now, you have not proceeded in your inference from the intoxicants, or the alcoholic beverages, which are universals, to the disputed point itself, which is more specific than both alcoholic beverages and wine. Therefore, this is not an inference that proceeds from the universal to the particular; rather, it is from the universal that you have inferred the prohibition of wine. The logicians argue that since the prohibition of wine is subsumed under the prohibition of all intoxicants, this would be an inference that proceeds from the universal to the particular.

196. The verification of the matter is that what is affirmed of the universal is affirmed of each of its particulars. Prohibition is more general than, and is affirmed of, alcoholic beverages, and thus it is affirmed of each particular falling under alcoholic beverages. Therefore, this is an inference that proceeds from the affirmation of one universal to the affirmation of the particulars of another universal. The aforementioned indicant stands as a particular in relation to that universal, and as a universal in relation to these particulars. This they do not dispute, for the indicant is the middle term, and it is more general than, or equal to, the minor term, whereas the major term is equal to, or more general than, the middle term. The major term is the judgement, the characteristic, the predicate; it is the predicate in the conclusion. The minor term, on the other hand, is the matter judged, the object of characterization, the subject; it is the subject in the conclusion.

197. If their view concerning analogy—namely, that it proceeds from one particular to another<sup>1</sup>—is stated in an unqualified manner as 'an inference proceeding from a single particular to another', then this view is erroneous. In analogy the inference proceeds on the basis of a middle term, that is, the two particulars having in common the cause of the judgement, or having the indicant of the judgement together with the cause. Such an inference is either causal (qiyās 'illa) or indicational (qiyās dalāla).<sup>2</sup>

198. As to the argumentum a simili (qiyās shabah), if it is used, there will only be two possibilities: the common factor between the original and the assimilated cases may be either the cause itself or something which entails the cause. Having in common what entails the cause does not necessarily entail the judgement common to the two cases, for this commonality may or may not be conjoined with the cause. Therefore, we cannot be certain of the validity of this argument, since its validity depends on the cause being common to both the original and the assimilated cases. We cannot be certain of this commonality unless we know that the two cases share a cause or share that which is a consequent of such a cause, for the affirmation of the antecedent entails the affirmation of the consequent. If we assume that both cases possess in common neither the antecedent nor the cause itself, then the analogy will certainly be false, because

<sup>197 &</sup>lt;sup>1</sup> Ibn Sınā, Najāt, 93; Rāzī, Tahrīr, 166; Ghazālı, Maqāṣid, 90.
<sup>2</sup> For qiyās al-'illa and qiyās al-dalāla, see par. 59, n. 1, above.

the cause will be restricted to the original case; and as long as it is so restricted, one cannot know if the analogy is valid.<sup>1</sup>

199. The validity of analogy may be ascertained by the non-existence of differences between the original and the assimilated cases. The non-existence of differences necessitates that the two cases possess in common a single judgement, although the cause itself or its indicant may not be known. Analogy may be made complete by proving the non-existence of differences or by showing a common factor (jāmi'). Analogy encompasses both types, and both entail a judgement. Each of them can be cast in the form of a categorical syllogism in which the judgement is conjoined with the universal and the universal with its particulars. This is the true nature of the categorical syllogism. Analogy is not an inference that merely proceeds from the affirmation of the judgement in one particular to its affirmation in another particular.

200. Should it be asked: 'How is one to know that the common factor entails a judgement?' We reply: we know this in the same way that the major premiss in the syllogism is known. The middle term is the common factor. The conjoinment of the major term with the middle term amounts to the conjoinment of the judgement with the common factor, as has already been mentioned. When one particular is conjoined with, or is an antecedent—and not a consequent—to another, an inference may proceed from one to the other. If the necessary connection is that of the essence ('an al-dhāt), then the proof will derive from the essence; but if the connection is based on an attribute or a judgement, then the inference will proceed from that attribute or judgement. It is clear then that their restricting inferences [to the three types they have determined] is erroneous.

<sup>198 &</sup>lt;sup>1</sup> For a different (Hanbalī) view of argumentum a simili, see Ibn Qudāma, Rawdat al-Nāzir, 279-80.

<sup>199</sup> In legal theory, this type of analogy is known as qiyās fi ma'nā al-asl or tanqīh al-manāt. It is an analogy from the negative, that is, the similarity between two things is determined on the grounds that in certain relevant respects the two objects are not different. For this analogy to be valid, it is not a condition that the positive, relevant similarity in the two things be established. Now, this analogy is thought to lead to conclusive knowledge when the absence of any difference between two objects or cases is established with certainty. For example, a male slave ('aba') is accorded the same contractual rights of manumission as those of a female slave (ama) on the grounds that they are not different in any respect relative to contractual obligations. The decision to accord the same rights is considered certain. However, when the absence of difference is not conclusive, analogy leads to probable knowledge. See Tahānawī, Kashshāf, ii. 1196, s.v. qiyās; Ibn Qudāma, Rawdat al-Nāzir, 249-50.

201. All three types of argument they have distinguished revert to the aforementioned conjoinment of the indicant with what is indicated. The categorical syllogism they have elaborated may be cast in the conditional form, and vice versa. The issue then comes down to one meaning, namely, the subject-matter of the indicant. One cannot know this subject-matter through the syllogistic form they have upheld. If one comprehends the subject-matter in such a way that one realizes that a certain thing entails another, then one will come to grips with the process of inference (dalāla), be it cast in a syllogistic form or not, or formulated in their terminology or not. In fact, the terminology which the intellects and the language of Muslims have developed is much better than the logicians' terminology.

202. The categorical syllogism comes down to one thing entailing another, and this last entailing yet another—as has been mentioned. This syllogism is the same as the conditional syllogism, which consists of [two types]: the hypothetical and the disjunctive. The conditional hypothetical syllogism is an inference made on the basis of entailment; it proceeds from the affirmation of the antecedent, which is a prerequisite constituting a condition, to the affirmation of the consequent, which is an effect constituting an apodosis. It also proceeds from the denial of the consequent, which is the effect constituting an apodosis, to the denial of the antecedent, which is a prerequisite constituting a condition.

theorists call Classification and Successive Elimination (al-sabr wal-taqsīm) and the dialecticians call 'Classification and Examination' (al-taqsīm wal-tardīd),<sup>1</sup> it is an inference which proceeds from the affirmation of one matter to the denial of another contradictory matter, or from the denial of the former to the affirmation of the latter. It consists of four<sup>2</sup> parts; thus, the disjunctive syllogism (māni'at al-jam' wal-khuluww)<sup>3</sup> constitutes four conditionals; that is, if a thing is affirmed, then its contradictory is denied, or if its contradictory is affirmed, then the thing itself is denied. Or, if the thing is denied, then the thing is affirmed, or if its contradictory is denied, then the thing is affirmed. Positive exclusion proceeds from the

<sup>203 &</sup>lt;sup>1</sup> On the method of Classification and Successive Elimination, see par. 61, n. 2, above.

<sup>&</sup>lt;sup>2</sup> Cf. par. 121 above and notes thereto.

<sup>&</sup>lt;sup>3</sup> Namely, the first type of the disjunctive alternative syllogism, as it has already been expounded in par. 121 above.

affirmation of one thing to the denial of its contraries, both being mutually exclusive. Negative exclusion, on the other hand, is based on contradiction and entailment; the two contradictories cannot both be false, and thus they cannot both be denied. The apodosis of negative exclusion is the existence of one thing that is true and another that is false, not the coexistence in one thing of truth and falsehood. Two things, one true and the other false, may entail each other, though they cannot both be false, because their both being false violates the Law of the Excluded Middle.<sup>4</sup>

204. Generally speaking, all things have concomitants without which they cannot exist, and all have contraries which negate their existence. Thus the existence of a thing is inferred from the existence of its concomitant, and its non-existence from the non-existence of that concomitant. The non-existence of a thing is inferred from the existence of its contradictory, and from the non-existence of its contradictory one infers its existence, provided that these two are the only possibilities involved. They cannot both be non-existent, and cannot both be existent. Such an inference is the result of knowing the nature of a thing, its antecedent, and its consequent. When natural intelligence forms a concept of a thing, it expresses the concept in a variety of ways and casts it in different forms of inference. But none of this is restricted to the syllogistic form they have prescribed, nor to what they have called demonstration. They have asserted that demonstration must consist of a particular type of subject-matter; namely, the propositions they have prescribed.<sup>2</sup> They have excluded from first principles what they term estimations (wahmiyyāt)<sup>3</sup> and widespread premisses (mashhūrāt).<sup>4</sup> But the reasoning of natural intelligence on the basis of these, especially the former, is superior to its reasoning on the basis of the apodictic premisses they have deemed to be the subject-matter of demonstration.

<sup>&</sup>lt;sup>4</sup> Note that the Arabic of the last few words is: 'li'anna irtifā'ahumā yaqtadı irtifā'a wujūdi al-shay'i wa-'adamihi ma'an' ('because their both being false necessitates the simultaneous existence and non-existence of one and the same thing').

Put differently, they cannot both be true and they cannot both be false.
 Ghazālī, Mi'yār, 186 ff.; idem, Maqāṣid, 101, 102-4; Rāzı, Tahrīr, 166-7.

<sup>&</sup>lt;sup>3</sup> Estimations (wahmiyyāt) are false propositions that stem from illusion, not sense perception. Inferences consisting of such premisses are known as sophistical. Rāzı, Tahrīr, 168; Ghazālı, Maqāsid, 111.

<sup>&</sup>lt;sup>4</sup> Mashhūrāt are universally accepted propositions, such as the notions that justice is good and tyranny is bad. The philosophers held that unlike a priori propositions, which are certain, mashhūrāt may be false. Rāzī, Tahrīr, 168; Baghdādī, Mu'tabar, i. 207; Black, Logic, 141-3. For a detailed critique of the philosophical position, see al-Radd, 396-437.

205. I have explained this matter in detail and have expounded their views and contradictions with regard to it. By excluding such subject-matter from first principles, they have omitted the means by which the noblest of sciences, theoretical and applied, are acquired. What they are left with is nothing but matters subsisting in the mind, matters which have no existence in the external world. Had there been sufficient space here, I would have discussed their views on this issue together with my objections. But I have discussed all these matters where they were relevant when dealing with the universal and metaphysical sciences, for these are the issues that are to be sought.<sup>1</sup>

206. We have discoursed on logic because they have claimed that logic is a canonical instrument which, when correctly used, safeguards the mind from error. Thus we needed to examine this instrument to see whether or not it is what they say it is. When some of their masters are shown the falseness of their views which reveal their error, and when they fail to defend them, they proclaim: 'These sciences have been developed for over a millennium by intellects and have found acceptance amongst eminent people.' But to this we give the following answers:

207. First, their claim is not valid, because intelligent people, who are superior to them, have always rejected their arguments and demonstrated their falsehoods and errors. As for the ancients, disagreements amongst them are many and well known. They are recorded in annals as well as in their own writings. This, however, is not the place to discuss such matters. But during the epoch of Islam, Muslim thinkers have extensively commented on the falseness of their logical, metaphysical, and even physical and mathematical principles. All Muslim sects, even the Rāfidīs, have written on such falsehoods. All sects of the other faiths and their scholars have testified to the logicians' error and heresy; the knowledge of their errors and heresy is so widespread that no person would deny it, save for those who are pertinacious. The faithful are God's witnesses

<sup>205 &</sup>lt;sup>I</sup> Ibn Taymiyya's criticism of the philosophers, mystics, and theologians may be found in a good number of treatises and tracts. See e.g. Muwāfaqat Sahīh al-Manqūl; Tawhīd al-Rubūbiyya; Mufassal al-I'tiqād; Naqd al-Mantiq; Tawhīd al-Ulūhiyya; Tafsīl al-Iimāl.

<sup>206 &</sup>lt;sup>1</sup> See par. 163, n. 1, above.

<sup>207 &</sup>lt;sup>1</sup> The reference here may well be to the critique made by Abū Muhammad al-Nawbakhtī. See par. 282, n. 4. below.

on earth. If the eminent, distinguished scholars of all Muslim sects as well as other learned men and believers have declared the logicians, in general terms or in detail, to be erroneous and heretical, then it cannot be that all learned men have accepted their views.

208. Second, their argument has no validity because the philosophy that was predominant prior to Aristotle and which was adopted by his predecessors was refuted for the most part by Aristotle, who demonstrated their error. Ibn Sīna and his followers also disagreed with the ancients concerning a number of views the ancients espoused, and have demonstrated their fallacies. The philosophers' attacks on each other surpass the attacks of any group against another. Abū al-Barakāt [al-Baghdādī]¹ and his likes² have also seriously criticized Aristotle; and they maintained that 'our goal is the truth, not the fanatic following of a certain man or opinion'.

209. Third, the religion of idolaters is older than their philosophy, and those who followed this religion are far greater in number than those who followed the logicians. Also older than their philosophy is the altered religion of the Jews; and the altered religion of the Christians is close to Aristotle's time. For Aristotle lived about three hundred years before Christ, so he was a contemporary of Alexander the son of Philip whose [era] is recorded in the annals of the Greeks (al-Rūm) to which the Jews and Christians refer.

210. Fourth, even if we suppose that what they maintain is true, these sciences are purely rational, and no one can acquire them by blindly following the authority (taqlid) of others, but only by means of pure reason. They cannot be validated by revelation, and cannot be discussed except in purely rational terms. Therefore, if untainted reason proves something in these sciences to be invalid, then reason must not be abjured. Those who have adopted these sciences claim that such sciences are not derived from an authority in which one must have faith, but rather from sheer reason. Thus, only unadulterated reason should be the ultimate judge in these sciences.

211. They have argued<sup>1</sup> that induction is inferior to syllogism, that is, to the categorical syllogism, and that analogy is inferior to induction.<sup>2</sup> They have maintained that unlike induction, which may

 <sup>208 &</sup>lt;sup>1</sup> Cf. Pines, 'Studies in Abu'I-Barakāt', 264 ff., 285 ff., 310 ff.
 <sup>2</sup> Such as Nawbakhtī. See par. 282, n. 4, below.

<sup>211 &</sup>lt;sup>1</sup> This and the following paragraphs (212-15) are Ibn Taymiyya's summary of the logicians' views concerning the epistemological weakness of analogy.

<sup>2</sup> See par. 190, n. 1, above.

lead to certainty and in which the matter judged can only be a universal, analogy leads only to probability and that what is judged may be a particular.<sup>3</sup> They have held this on the ground that in induction the universal is judged by that which is found in its particulars. If all particulars are enumerated, then induction will be complete, as in the judgement that things which move have bodies, since all the particulars which move, be they inanimate objects, animals, or plants, are judged by this attribute. An instance of incomplete induction is the judgement that animals move their lower jaw when they chew because this [phenomenon] has been found to be the case in most instances. It may be that other instances, such as that of the crocodile, were not surveyed.<sup>4</sup> Unlike incomplete induction, which is employed in dialectic, perfect induction is used in certitude.

212. Analogy, however, is assigning to one thing the judgement of another thing on the ground that both possess a common factor, as in the example they adduce: 'The World exists, and therefore it is eternal just like the Creator'; or, 'The World is corporeal, and therefore it is created just like man.' Analogy consists of an assimilated case, an original case, a cause, and a judgement. In the aforementioned examples, the assimilated case is 'World', the original case is 'Creator' and 'man', the cause is 'existent' and 'corporeal', and the judgement is 'eternal' and 'created'. They maintain that induction differs from analogy in that the matter judged in analogy may be particular, but in induction it is always universal.2 And analogy, they have added, does not lead to certainty, because the factor common to two matters does not necessarily entail that the judgement of one matter is applicable to the other, unless it is shown that what is common to them is a cause of that judgement. But this last can only be probable, because the rational method by which this is shown is confined—for those who use it—to Coextensiveness-cum-Coexclusiveness (tard wa-'aks) and Classification and Successive Elimination (sabr wa-taqsīm).3

<sup>&</sup>lt;sup>3</sup> Ibid. See also Tūsī, Sharh al-Ishārāt, i. 418; Ghazālī, Mi'yār, 160-1, 165 ff.; Ibn Rushd, Talkhīs Mantiq Aristā, i. 352-4.

<sup>&</sup>lt;sup>4</sup> Ibn Sınā, Ishārāt, i. 418 (English trans., 127); Tūsī, Sharh al-Ishārāt, i. 418; Ghazālı, Maqāsid, 89-90.

<sup>212 1</sup> For the components of analogy, see par. 60, n. 5, above.

<sup>&</sup>lt;sup>2</sup> See n. 3 in the preceding paragraph.

<sup>&</sup>lt;sup>3</sup> For Coextensiveness-cum-Coexclusiveness, see par. 61, n. 4; for Classification and Successive Elimination, see pars. 61, n. 2, and 203 above.

213. Coextensiveness-cum-Coexclusiveness is nothing but the conjoinment of the judgement with the cause in both their presence and absence. This [principle] is also indispensable in induction, although it is not applicable to the assimilated case because what is sought to be proven is not the assimilated case. Induction will thus be incomplete, especially since the cause of the judgement in the original case may be composed of the common attributes plus other attributes, and the cause's presence in these attributes is substantiated. When the common attribute is found in the original case, the judgement will then be established since the cause is complete. On the other hand, if the attribute is not present, the judgement will not be present because the cause is absent. In this case, the presence of the common factor in the assimilated case does not necessarily entail the affirmation of the judgement therein, because other attributes or a part thereof may not be present.

214. Classification and Successive Elimination is mainly an argument in which the attributes in the original case are enumerated, and then all attributes that prove invalid are eliminated, so that what remains is the cause. This method also does not lead to certainty, because it is possible that the judgement may be affirmed of the original case on the basis of the case itself and not by virtue of an external cause, for in that event an infinite regress inevitably results. If the judgement is affirmed on account of an external cause, it is possible that the [real] cause is other than what appears to be the cause—one may not find the cause even though one may have searched for it. In customary matters this is not the case, since we would not doubt-provided our vision were sound and physical obstacles were removed—that we would see a sea of mercury or a mountain of gold should they exist before us. The cause of the original case may be the totality, or part, of the attributes enumerated, and these may not be realized in the assimilated case. The affirmation of the judgement in an assimilated case on the basis of a common factor without taking into account other attributes which coexist with that factor in the original case undercuts the causality of the judgement, because it is possible that the latter may have another cause. This is quite conceivable. But even if the judgement has no other cause, the cause may underlie a specific, not a general judgement. When the attribute is shown to necessitate the judgement on account of its universal essence—however unlikely this may be—analogy will not be needed.

215. They have argued: 'Physiognomy (al-firāsa al-badaniyya) is identical with analogy, with the exception that in the former the common factor is the indicant of the cause, not the cause itself. In the idiom of the jurists, physiognomy would be known as "indicational analogy" (qiyās dalāla). The inference in physiognomy proceeds from the effect of the cause to the cause itself and then from that cause to another effect. For physiognomy is based upon the assumption that the physical constitution (mizāj) is the cause of inward and outward appearances: the inference proceeds from outward appearances to physical constitution, and from physical constitution to inward appearances; for example, one infers that, as is the case with lions, stout shoulders and head indicate courage on the ground that both [stoutness and courage] are the causal consequents of a given constitution. But in order to establish the cause in the original case, the methods of Coextensiveness-cum-Coexclusiveness (dawarān) or Classification and Successive Elimination must be used, as we have already mentioned. Should the cause of the two judgements in the assimilated case be one and the same, then one of the two judgements may be affirmed of the assimilated case without the cause found in the original case. In this event, the other judgement will not be entailed.'2 These are their views.3

and analogy—that their distinction between a categorical syllogism and analogy—that the former is capable of leading to certainty while the latter to nothing but probability—is invalid. In fact, whenever one of them leads to certainty so does the other, and whenever one of them leads to nothing but probability the other does likewise. When the evidence results in certainty or in probability, this is so not because its form is syllogistic and not analogical, but rather because the syllogism contains conclusive evidence. If either an analogy or a syllogism encompasses a matter that entails a certain judgement, then certainty is attained. However, if they encompass a matter that entails a probable judgement, then only probable knowledge obtains. What is known in a syllogism as the middle term is the common attribute in analogy. The major premiss containing the major term's entailment of the minor demonstrates the efficiency of the attribute common to both cases, the original and the assimilated. That which

<sup>215 &</sup>lt;sup>1</sup> Cf. Ibn Sīnā, Najāt, 95, who maintains that the physiognomical inference resembles both the enthymeme (qiyās idmārī) and analogy.

<sup>&</sup>lt;sup>2</sup> Ibid.; Baghdadī, Mu'tabar, i. 202-3.

<sup>&</sup>lt;sup>3</sup> See par. 211, n. 1, above.

proves the truthfulness of the major premiss also proves that the common denominator entails the judgement; the major term's entailment of the middle in a syllogism amounts to the judgement's entailment of the common denominator in an analogy.

- 217. You may say: 'In analogy with date-wine, grape-wine was prohibited because alcoholic beverages were rendered forbidden on the ground that they are intoxicants, and the attribute of intoxication is found in date-wine.' This statement would be tantamount to saying: 'All wine is intoxicating, and all intoxicants are prohibited; therefore, wine is prohibited.' 'Wine' is the subject of the conclusion, and it is the minor term; whereas 'prohibition' is its predicate and is the major term. 'Intoxicants' takes a middle position between the subject and the predicate; it is the middle term, which represents the predicate of the minor and the subject of the major.
- 218. You may argue: 'In analogy with date-wine, grape-wine is prohibited since the cause in the original case is intoxication, and this last is found in the assimilated case. Therefore, prohibition is established on the ground that the cause is present.' Here, you have inferred the prohibition of wine on the basis of intoxication, which is the middle term. In analogy, however, you add the mention of the original case on the basis of which the judgement of the assimilated case is established. This is done because the mind is quicker to perceive the similarity between the original and the assimilated cases than to comprehend the mere subsumption of the latter under a universal, comprehensive statement. However, if the efficiency of the common attribute is proven, there need not be mention of the original case.
- 219. An analogy is drawn either by demonstrating a common denominator or by proving the absence of differences [between the assimilated and the original cases]. The common denominator is either the cause itself or its indicant. Proving the absence of differences in analogy here means establishing the middle term. One may say: 'A is equal to C and B is equal to C, therefore A is equal to B.' Here, the equivalence is the middle term.<sup>2</sup> Proving the absence of

<sup>&</sup>lt;sup>2</sup> Note that Ibn Taymiyya considers this equivalence analogical, while the philosophers generally deem it syllogistic. For a logical account of the syllogism of equivalence (qiyās al-musāwāt) see Ibn Sīnā, Ishārāt, i. 495-6 (English trans., 145). On the other hand, Tūsī, Sharh al-Ishārāt, i. 495, does acknowledge that qiyās al-musāwāt may encompass analogy (mumāthala wa-mushābaha).

differences represents equivalence. To maintain that the only difference between the assimilated and the original cases is such-andsuch, and that this difference is irrelevant, is to maintain that the assimilated case is equal to the original case, and that the judgement of the one is the same as the judgement of the other.

220. To their argument that the common attribute, which is the cause of judgement, is only probable, we respond that we disagree because theirs is a categorical claim which they have not proven. We proceed to say: that which proves the causality of the common attribute is the same as that which proves the truthfulness of the major proposition. Conversely, what proves the truthfulness of the major premiss in a categorical syllogism is the same as that which proves the causality of the common attribute in analogy, be it certain or probable. The common denominator in analogy is the middle term. The concomitance of this denominator with the judgement represents the concomitance of the major with the middle term, and the concomitance of the common denominator with the minor term, and this represents the establishment of the cause in the assimilated case.

221. If the common attribute—known as the common denominator, the cause, the evidence of the cause, the locus, etc.—is established in, and conjoined with, the assimilated case, then this entails the truth of the minor premiss. Likewise, if the judgement is affirmed of, and concomitant with, the common attribute, then this entails the truth of the major premiss. The inclusion of the original case leads to the affirmation of one of the two premisses. When analogy is drawn by means of proving the absence of differences, then a particular, original case must exist, because the commonality represents the equality and similitude between the two cases, namely, the absence of difference, which is the middle term. On the other hand, when analogy is drawn by means of demonstrating the existence of a cause, the mention of the original case may be omitted, provided that it is not needed in proving the causality of the attribute. However, if the original case, which is the major term, is needed in order to prove the causality of the attribute, then this case must be mentioned because it complements the proof of the common denominator's causality.

222. Those who draw a distinction between analogy and the categorical syllogism attempt to show that analogy leads to probability when it is formed of a particular subject-matter. The subject-matter

that leads only to probability in analogy also leads to nothing but probability in a categorical syllogism. If they take a subject-matter that leads to certainty in a categorical syllogism, then it will lead to certainty in analogy as well. Indeed, in analogy certainty appears even more perfect, for if it is stated in a categorical syllogism that 'Every man is an animal, and every animal is corporeal; therefore, every man is corporeal', then 'animal' is the middle term. In analogy it is the common denominator, for one may argue: 'Man is corporeal in analogy to horses and other animals.' Now, these animals qua animals entail their being corporeal. If the cause of the judgement in the original case is disputed, and if one argues: 'We do not agree that animality entails corporeality', then the dispute will be about the statement 'Every animal is corporeal', because if the denominator, common to the original and the assimilated cases, is recognized as a cause, then what is meant by it is that which entails a judgement, whether the common denominator is itself the cause which brings about a judgement outside the mind or that which entails such a cause.

223. Some scholars call both of these 'causes', <sup>I</sup> especially those who hold that what is meant by 'cause' is the identifier (mu'arrif)—i.e. the sign (amāra), the characteristic ('alāma), <sup>2</sup> the indicant, not the efficient cause or the motive. <sup>3</sup> Those who mean by cause the motive, which is the efficient cause, recognize also the causality of acts. Other than in acts, the cause may be explained in terms of a necessitating attribute (wasf mustalzim), such as humanity entailing animality and animality entailing corporeality, without one producing an effect (mu'aththir) upon the other. We have explained elsewhere that what leads to the knowledge that an animal is corporeal itself leads to the knowledge that man is corporeal, since we have demonstrated that the categorical syllogism they uphold is of little use, if any at all. We have also explained that what leads to knowledge of

<sup>223 &</sup>lt;sup>1</sup> That is, both the cause which entails a judgement and that which is not a cause proper but is concomitant with such a cause and is thus capable of effecting a judgement.

<sup>2</sup> See par. 132, n. 1, above. Amāra and 'alāma are virtual synonyms. Jurjānī, Ta'rīfāt, 29, s.v. amāra.

<sup>&</sup>lt;sup>3</sup> Āmidī, *Iḥkām*, iii. 17-18, remarks that Muslim scholars have disagreed on whether or not the term 'illa (cause) must be exclusively used for that which points out and merely signifies the judgement. Āmidī himself subscribes to what seems to be the majority position that the 'illa must encompass a motive which is the rationale (hikma) behind the revelation of a judgement for a given case.

the truth of the major premiss in rational matters itself leads to knowledge of the truth of the particulars subsumed under that premiss, including the minor premiss as well as the conclusion. (Ibn Taymiyya then said): their contradictions and errors are far beyond what can be recorded here.<sup>4</sup>

224. Our purpose here is to comment on logic, on their views concerning demonstration, on their exaltation of the categorical syllogism and their underestimation of analogy, and on their claim that the latter leads merely to probability while certain knowledge is obtained only through the former. This claim is false, for both categorical syllogism and analogy are in fact of the same kind. A valid analogy is better suited to lead to a conclusion, be it certain or probable, than is a mere categorical syllogism. This is why most intelligent people resort to analogy more often than they do to a categorical syllogism. In fact, a categorical syllogism cannot be valid in inferring a general matter without the mediation of analogy. All that which constitutes proof concerning the validity of a categorical syllogism with regard to a given matter also constitutes proof concerning the validity of analogy in the same matter. Their doctrine that 'No more than one issues from one' is an example in point; it is one of the most famous of their erroneous metaphysical views. But their valid doctrines also demonstrate this, for a categorical syllogism, they all agree, must include a universal, affirmative proposition because two negative or particular premisses cannot result in a conclusion.

225. The universal exists only in the mind. If the particulars of a universal exist in the extramental world, then this will be conducive to the knowledge that it is a universal affirmative. Once a person senses the existence of an extramental matter, he derives therefrom a universal quality, especially if the particulars are numerous. The knowledge that a common quality is affirmed of an extramental particular from which a universal has been abstracted is the source of knowledge of a universal proposition. Thus, analogy is the source of

<sup>&</sup>lt;sup>4</sup> I am unable to locate this sentence in al-Radd. These must be Suyūṭī's own words referring to Ibn Taymiyya's critique of the philosophers' doctrine that 'only one issues from one' (al-Radd, 214-33). Having dominantly metaphysical contents, this criticism was excluded from the text abridged by Suyūṭī.

<sup>224 &</sup>lt;sup>I</sup> Baghdādī, Mu'tabar, iii. 156 ff.; Tūsī, Sharh al-Ishārāt, iii-iv. 645 ff.; Rāzī, Muhassal, 145-6; Ghazālı, Maqāsid, 288 ff.; Suhrawardī, Hikmat al-Ishrāq, 125. For a detailed critique of this doctrine, see al-Radd, 214 ff., 312 ff.

categorical syllogism; it is either a means of attaining a syllogism, or, one may argue, without it a syllogism cannot exist. So how can the latter be stronger than the former?

226. They illustrate the universals by giving such examples as 'the whole is greater than its individual parts', 'contradictories cannot be simultaneously both true and false', 'things equal to one thing are equal to one another', etc. A good number of extramental particulars belonging to each of these universals is known. If one of these universals is to be realized in the mind, an example of one of its particulars is given, and the absence of a difference, or the presence of a common factor between this and other particulars, is demonstrated. Thereupon, the mind determines that the judgement of the universal common to the particulars is affirmed. This is precisely what analogy is.

227. Even if we assume that a categorical syllogism stands in no need of analogy, and that the knowledge of universal propositions does not, to begin with, presuppose the knowledge of particulars, we cannot argue that knowledge of the universal, whose extramental particulars are known to exist, is less perfect than knowledge of that whose extramental particulars are unknown. The knowledge of particulars only adds to the perfection of the universal. It is therefore clear that the form of inference they have rejected is more perfect than that which they have adopted.

228. You also ought to know that in metaphysical as well as physical logic they have altered some of the doctrines of Aristotle. But what they have added to metaphysics is better than Aristotle's own doctrines, for I have reflected on both doctrines. In metaphysics, Aristotle and his followers are far more ignorant than the Jews and the Christians. In physics, however, most of his doctrines are good, and in logic his doctrines are better than those in metaphysics.

229. Views concerning the weakness of analogy have been propounded by more recent logicians<sup>1</sup> when they realized that the jurists often resort to analogy. The latter apply analogy frequently in probable subject-matters. Probability results here from the subject-matter, not the form of inference. Even if the inference were to be cast in the form of a categorical syllogism, the result would remain probable. The logicians thought that the weakness issues from the

<sup>229 &</sup>lt;sup>1</sup> The phrase 'more recent logicians' seems to refer to Fārābī and those who flourished after him. See e.g. Fārābī, al-Qiyās al-Saghīr, 266 ff. (English trans., 93 ff.).

form, so they declared the form of their inference to be certain, and that of the jurists to be probable. They cite theological examples in order to prove that the theologians employ probable inferences in their argumentation. An example of an inference they cite is: 'The celestial sphere is a composite body, and therefore it is contingent, analogous to man and other created beings.' Then they set out to prove the weakness of this inference. If they succeed in doing so, it is because its subject-matter is weak. This argument—adduced by the Jahmīs, the Qadarīs, and those Ash'arīs and others who followed them concerning the contingency of bodies—is weak because its subject-matter, not its form, is probable. Therefore, there is no difference between casting the argument in the form of analogy and casting it in the form of a categorical syllogism.

## Chapter [4]

230. THE FOURTH AND MOST ENIGMATIC POINT: Their Doctrine that Syllogism or Demonstration Leads to the Certain Knowledge of Judgements (tasdīqāt). The logicians' error concerning the first three points—i.e. that concepts cannot be formed except by means of the definition, that concepts are formed by means of the definition, and that no judgements can be attained except by means of the syllogism—is clear with the least of reflection; it is easy to prove and comprehend. But they have confused people by their exaggerations and protracted discussions. The most obvious of the errors is their claim that concepts cannot be formed except by means of the definitions they have prescribed. Next comes their claim that no judgement can be attained except by means of the syllogism they have set forth. There is no way to establish with certainty this categorical denial. In fact, there is no evidence to prove it. Its falsity is rather known on the grounds that judgements are attained without the syllogism they have prescribed, and concepts are formed without

<sup>&</sup>lt;sup>2</sup> See an almost identical example in Ibn Sīnā, *Najāt*, 93, and Tūsī, *Sharh al-Ishārāt*, i. 419-20.

<sup>230</sup> Like all Arabic logicians Ibn Sīna (*Ishārāt*, i. 185 (English trans., 49-50)) states that *taṣdīq* may be reached by one of the three main arguments, namely, the syllogism, induction, or analogy. And since induction and analogy do not lead to certainty, the only remaining apodictic argument is the syllogism. See sources cited in par. 41, n. 2, above.

the definitions they have expounded. These [matters] differ from the Fourth Point since a syllogism formed of two premisses resulting in a conclusion is in itself valid.

231. What Muslim thinkers have shown in their discussions of the Greek logic attributed to Aristotle is that the forms of the syllogism and the subject-matter that the logicians have elaborated with great efforts are of no use in the acquisition of knowledge. Indeed, anything whose knowledge can be acquired by means of their syllogisms can also be acquired by other means. Nothing in their syllogisms is indispensable for knowing what is otherwise unknown, and therefore the syllogism is needless. Logic does not effect knowledge when it is used, and when it is not, knowledge can still be acquired; logic involves a protracted, tedious procedure; and in addition to its being of no use as a means of acquiring knowledge, it is tiresome for the mind, time-wasting, and contains much drivel. Proofs and demonstrations, however, are expected to yield knowledge and to indicate the means by which that knowledge may be acquired.

232. Muslim thinkers have held that logic does not lead to the knowledge sought after, and may constitute an obstacle in the way of attaining that knowledge because logic is tedious for the mind. If a person wished to travel to Mecca or to other cities, he would, with moderate pace, arrive in a short time if he followed the familiar, straightforward path. However, if he had the misfortune of being led astray—linguistically, straying ('asf) means to roam about without following a designated path, to move in circles and to tread deviant ways<sup>1</sup>—he would be extremely tired before he arrived at his destination, that is, if he arrived at all. Otherwise, he might arrive at a different destination, and might entertain falsehoods, in addition to becoming weak because of exhaustion and fatigue overtaking him. If

233. Those who were present at the deathbed of Khūnajī, the

he maintained this state of simple ignorance<sup>2</sup> he would neither achieve his purpose nor find rest. This is the case with these logicians!

<sup>232 &</sup>lt;sup>1</sup> Ibn Manzūr, *Lisān al-Arab*, ix. 245-6. s.v. '-s-f-.

<sup>&</sup>lt;sup>2</sup> Simple ignorance (al-jahl al-basīt) is a condition in which the mind forms no concept of a particular object: it is not a misapprehension of a thing (the latter being known as complex ignorance, jahl murakkab), but rather a state of having no knowledge whatsoever of that thing. See Tahānawī, Kashshāf, i. 253-4, s.v. jahl: Jurjānī, Ta'rīfāt, 71, s.v. al-jahl al-basīt.

<sup>233 &</sup>lt;sup>1</sup> On Khūnajī, see par. 57, n. 1, above. Cf. Goldziher, 'Attitude of Orthodox Islam', 190.

chief logician of his time, reported that just before his death he said: 'I die knowing nothing except that the possible presupposes the necessary.' He then added: 'And presupposition is a negative attribute, so I die knowing nothing.'

234. This is their condition when they end up in a state of simple ignorance. But those who have reached the degree of complex ignorance<sup>1</sup> are many. People liken those among them who have mastered a certain science to a person who, when asked 'Where is your ear?', answers by extending his [right] hand, with effort, over his head to his [left] ear, when he could have pointed to it from below his head, for this would have been shorter and easier.<sup>2</sup>

235. When matters comprehended instinctively are approached by non-instinctive means, one will be tormenting the soul in vain. This is similar to the case of a man who is told to divide a certain sum of money into equal portions among a number of individuals, a task that should be performed without difficulty. Someone may say to him: 'Wait, you cannot divide it without knowing the definition of division and without drawing a distinction between division and multiplication. Division is the opposite of multiplication. The latter is carried out by compounding the units of one number by the units of the other, whereas the former by dividing the units of one number by the units of the other. This is why, when the quotient is multiplied by the divisor, the result is the dividend, and when the number resulting from multiplication is divided by one of the two numbers multiplied, the result is the other number.' He then adds: 'What I have said about the definition of multiplication is not valid because it applies to the multiplication of integers, not fractional numbers. An all-inclusive definition would be: Multiplication is the sum total whose relation to one of the numbers multiplied is the same as the relation of figure one to the other number.' He will further say: 'The multiplication of one-half by one-quarter results in one-eighth. The relation of one-eighth to one-quarter is the same as the relation of one-half to the figure one.' Although these are valid statements, it is clear that the person who has the money and who wishes to distribute it equally among a number of individuals would agonize in vain if he were to force himself to understand all this before he divided the

<sup>2</sup> See par. 125 above.

<sup>234 &</sup>lt;sup>1</sup> On complex ignorance (*jahl murakkab*), see par. 232, n. 2, above, and Jurjāni, *Ta'rīfāt*, 71, s.v. *al-jahl al-murakkab*.

money. He may not even understand these matters and may find them problematic.

236. The indicant and demonstration also lead one to what is to be proven and acquired. Whenever the indicant entails a matter, it can be used to infer that matter. Accordingly, it is said: 'Reasoning correctly on the basis of indicants leads to certain or probable knowledge.' What is meant is that whatever entails something such that it is that thing's antecedent constitutes an indicant as well as demonstrative evidence with regard to that thing, whether both are existent or non-existent, or one existent and the other non-existent. The indicant is at all times conjoined with what is indicated. The latter is the consequent of the former.

237. The indicant may be a single premiss from which, once it is known, the conclusion will [also] be known. The reasoner may need two, three, four, five, or more premisses. There is no fixed number of premisses that all people should use in the same way and in all enquiries. The number of premisses depends on the aptitude of the reasoner who investigates both the context of what is to be proven and the indicant together with its antecedents and consequents. If the reasoner were to know that the conclusion may be extracted from a single premiss, then the proof he would need in order to arrive at the conclusion would consist of that one premiss. For example, if someone knows that alcoholic beverages are prohibited, and that grape-wine is an inebriant, all he needs is the premiss 'All inebriants are alcoholic beverages', which he did not [previously] know. When he is told that in the Sahīh it was verified that the Prophet, may God praise him, said: 'All inebriants are alcoholic beverages', he will then reach his conclusion. He need not say 'Every wine is an inebriant' or 'Every inebriant is an alcoholic beverage'. Nor does he need to say 'Every inebriant is an alcoholic beverage' or 'Every alcoholic beverage is prohibited', for all this is obvious and known to him. However, he may not know whether the term 'alcoholic beverage' is limited to some inebriants—as a group of Muslims has held-or whether it comprises all inebriants. If he

<sup>236 &</sup>lt;sup>1</sup> This definition of indicant is juridical. See Bājī, *Hudūd*, 37-9; Tahānawī, *Kashshāf*, i. 492-3, s.v. *dalīl*. For a philosophical definition, see under *dalīl* in Jurjānī, *Ta'rīfāt*, 93, and Āmidı, *Mubīn*, 74. The former defines the indicant as affirming the middle term in a syllogism of the major, and the subsumption of the minor under the middle. See also par. 42, n. 2, above.

<sup>237</sup> See par. 52, n. 3, above.

establishes that the Lawgiver meant by 'alcoholic beverages' all inebriants and not particular ones, then he is able to prove what he set out to prove. In the Sahīh of Muslim, this tradition was narrated in two forms: 'Every inebriant is an alcoholic beverage' and 'Every inebriant is prohibited'. The Prophet did not say, in the manner of the Greeks, that 'Every inebriant is an alcoholic beverage' and 'Every alcoholic beverage is prohibited', for he, may God praise him, with his knowledge and eloquence, is far above expressing himself in their drivelling ways. He merely meant to lay down the judgement, and for doing so he did not need to produce evidence. But if he had meant to elucidate an indicant—since God clearly stated in the Quran all divine matters that determine belief in Him, in His messengers, and in the Day of Judgement—then he, may God praise him, would have been, of all beings, the most knowledgeable of the truth and the best fitted to expound it.

238. Thus, it is clear that not all inferences require as many as two premisses, nor is it sufficient in all of them to have only two. In order to achieve demonstrative proof, there should be as many premisses as are needed, be it one, two, or more. Furthermore, what is intended as universal guidance, such as the Quran which God revealed to mankind as eloquent demonstration, encompasses as many indicants as are necessary to benefit the generality of people. The general types of these indicants can be explicated; but those which are used by particular individuals cannot be precisely accounted for, and thus cannot be adequately characterized. These may be discarded since they are relevant only to the speaker—such as his praying for himself, or when others take into consideration his particular situation when they address him, or when he speaks of his own state of affairs, etc.

239. Furthermore, the syllogism they have elaborated does not lead to the knowledge of any particular existent. And those universal matters can be individually comprehended by means easier than their syllogism. No universal proposition may be known through their syllogism without its particulars being known by means of other inferences. Such inferences may well be easier, for the knowledge of particulars may be more explicit than the knowledge of universals, a matter we have discussed elsewhere.<sup>1</sup>

240. We mean to say here that what is sought after is knowledge,

<sup>&</sup>lt;sup>2</sup> See par. 52, n. 3, above.

<sup>239</sup> See e.g. pars. 56 above and 261-7 below.

and the means to it is the indicant. Thus, he who knows the indicant pertaining to what he seeks to prove will prove it, whether he casts the inference in the form of their syllogism or not. But if he does not know that indicant, then the logicians' syllogism will be of no use to him. No one but an ignoramus who does not understand the nature of their syllogism will claim that the syllogism serves to distinguish between true and false proofs. The truth about their syllogism is that it offers nothing but the mode and form of the inference.

241. As for the indicant which entails what is indicated, there is nothing in their syllogism to deny or affirm it. I Such entailment depends on the premisses known to be encompassed by the indicant; their syllogism does not deal with validating or invalidating premisses. The logicians discuss this matter only when they treat of the subjectmatter of a syllogism, that is, when they discuss the premisses in so far as their validation is concerned. But their views on these issues, as we have mentioned elsewhere, are replete with errors.<sup>2</sup>

242. What is meant here is that the truth which must be considered in any demonstration or indicant existing in the world is concomitance (luzūm). When one knows that a thing is concomitant with another, one will infer the consequent from the antecedent, though one may not employ the term 'concomitance' or even conceive its meaning. For if one knows that a certain thing requires another, or that in order for one thing to exist another must exist, etc., then one will apprehend that concomitance. For example, it is known that everything in existence is a sign  $(\bar{a}ya)$  of God, for existence requires and presupposes Him; it is necessary for everything to have a creator, as God, the Exalted, has said: 'Or were they created out of nothing? Or are they the creators?' Jubayr b. Mut'im said: 'When I heard this verse I felt my heart was broken.'2 This is an all-inclusive classification.<sup>3</sup> The most preliminary intellectual reflection will preclude

<sup>241 1</sup> That is, there is nothing in the syllogism as such that establishes the truthfulness of the middle term as predicated of the major or minor term.

<sup>&</sup>lt;sup>2</sup> See e.g. pars. 302-6; al-Radd, 384 ff. For the philosophers' discussion concerning the subject-matter of premisses, see Ibn Sīnā, Najāt, 97 ff.; idem, Ishārāt, i. 510 ff. (English trans., 148-9); Ghazālı, Maqāsid, 100 ff.; Rāzī, Tahrīr, 166 ff.

<sup>&</sup>lt;sup>2</sup> Quran, 52: 35.

<sup>2</sup> Bukhārī, *Sahīh*, iii. 339. Jubayr b. Mut'im b. 'Adī b. Nawfal b. 'Abd Manāf (d. 58/677 or 59/678) is identified as someone who converted to Islam towards the end of the Prophet's career.

<sup>&</sup>lt;sup>3</sup> The reference is to the aforestated Quranic verse which offers no fourth logical possibility; either the World created itself, or it was created ex nihilo through no agency, or God was the Creator.

the argument that men were created without a creator. That they created themselves would be even more unacceptable. Therefore, it will be known that a creator created them.

243. God, may He be glorified, revealed the indicant in the form of a disapproving question in order to make it obvious that the proposition used as an indicant is instinctive, self-evident, well rooted in minds, and undeniable. No one of sound intelligence can argue for the existence of a created being without arguing for the existence of the creator of that being. Nor can one claim that the being is self-created.

244. Many scholars adopt a certain method of inference and argue that no other method can lead to the knowledge required. This negative statement has no validity, though their own method may be valid. The more that people need to know a thing the easier God makes it for their minds to apprehend the indicants which lead to that thing. The indicants establishing the existence of the Maker, His unity, and the signs of prophecy are very many, and people employ numerous methods in order to apprehend such indicants.

245. Most people, however, do not need many of these methods, and those who use them are either unfamiliar with other methods or they avoid them. Some people find more benefit in subtle and obscure methods which are lengthy and which encompass many premisses, because their minds are accustomed to reflect upon intricate matters. They are not pleased when the proof consists of a few, obvious premisses. With such people logico-theological and other similar methods may be used, since such methods agree with their nature, though the knowledge being sought does not absolutely depend on such methods. There are those who, when comprehending something which the common, not so bright people are capable of comprehending, do not consider themselves to have excelled over the latter in any science; so they become inclined to acquire the knowledge of hidden and intricate matters which consist of many premisses. This is why many of the Sunnī scholars like to study intricate, exact sciences, such as algebra, Reduction (muqābala), difficult cases in the laws of inheritance and bequests, and the science of circular reasoning,<sup>2</sup> which is valid in and by itself.

246. The science of inheritance is of two types: legal rulings and

<sup>&</sup>lt;sup>2</sup> See par. 81, n. 2, above.

i.e. the science of circular reasoning as it pertains to cases of positive law. For an example of reasoning in one such case, see par. 248, n. 1, below.

arithmetic. Legal rulings are of three types: the first is the legal rulings according to the doctrines of a particular jurist: the second is the science of the Companions' traditions concerning their disagreements about these rulings; and the third is the science dealing with the indicants (adilla) derived from the Book and the Sunna. On the other hand, the arithmetic of inheritance deals with the principles governing legal cases, their validation, their abrogation, and the division of estates. This second type is entirely rational and is known by means of the intellect just like the arithmetic of legal transactions and other matters which people are in need of. Under this science they have also treated the arithmetic of the unknown (majhūl), which is called algebra, and Reduction—an ancient science. The first person known to have incorporated algebra and Reduction into the science of bequests and circular argumentation is Muhammad b. Mūsā al-Khuwārizmī. I Some people cite 'Alī b. Abī Ṭālib as someone who dealt with it, and who learned it from a Jew. But this is a lie.

247. The term 'circularity' (dawr) is applied to three types of argument. [The first is] universal circularity  $(dawr \ kawnt)$  employed in rational inferences; namely, P cannot exist without the existence of Q, but Q cannot exist without the existence of P.\(^1\) A group of scholars has deemed this argument invalid. Amid\(^1\) and others have rightly held that circularity is of two types: petitio principii  $(dawr \ qablt)$  and conjunctive circularity  $(dawr \ ma^*i)$ .\(^2\) The former, considered invalid, is employed in reasoning about causes, about the agent, the efficient [cause], etc., as when one says that two things cannot be the causes of each other, for this would lead to circularity that entails the existence of both things before each other. The latter, on the other hand, is valid. It is the circular, simultaneous existence of the condition (shart) with the conditioned  $(mashr\(\bar{u}t)$ ), or of one attribute with another. For example, fatherhood cannot exist without sonship, and sonship cannot exist without fatherhood.

248. The second type is the circularity found in cases of positive

<sup>2</sup> See par. 46, n. 5, above.

<sup>246 &</sup>lt;sup>1</sup> Abu 'Alī Muhammad b. Mūsā al-Khuwārizmī (d. after 232/846), the author of *Kitāb al-Jabr wal-Muqābala*. See Brockelmann, *Geschichte*, suppl. i. 381-2, and sources cited in par. 81, n. 2, above.

<sup>247 &</sup>lt;sup>1</sup> Arabic: 'lā yakūn hādhā hattā yakūn hādhā wa-lā yakūn hādhā hattā yakūn hādhā'. I have substituted P and  $\hat{Q}$  for  $h\bar{a}dh\bar{a}$ .

law such as that mentioned in the Surayjiyya and other cases.<sup>1</sup> We have dedicated a treatise to this circularity and shown it to be invalid, on the basis of both reason and revelation.<sup>2</sup> We have also shown whether or not the Law contains elements of this circularity.

249. The third type is arithmetical circularity, as in the statement: P cannot be known until Q is known. The solution to this is sought by means of arithmetic, algebra, and Reduction. We have shown that all legal questions introduced by the Messenger, may God praise him, can be solved without resorting to algebra and Reduction, though these sciences are legitimate. We have also shown that the Law of Islam and the means by which it is arrived at do not depend on any science that is learned from non-Muslims, though such a science may be valid. For the methods of algebra and Reduction are indeed prolix, and as we have said with regard to logic, God has provided us with other methods to substitute for them.

250. Thus, everything the Prophet, may God praise him, decreed, such as the knowledge of the Qibla's direction, of the times of daily prayer, of daybreak and the appearance of the crescent moon—all this may be known through the methods which the Companions and those who voluntarily followed them adopted; they needed nothing else. Many people, however, have invented other methods, without which, they thought, one cannot arrive at the Law. But they have done this because they are ignorant. They are like those who think that without knowing the longitudes and latitudes of countries, the direction of the Qibla cannot be known. Though these [methods of theirs] are arithmetically valid and are arrived at by means of reason, the Muslims' knowledge of their Qibla does not depend upon them.

<sup>248 &</sup>lt;sup>1</sup> The Surayjiyya is traditionally a Shāfi'ī case of divorce that takes its name from the renowned Shāfi'i jurist Aḥmad b. 'Umar Ibn Surayj (d. 306/918), although other legal schools later participated in the controversy surrounding this case. This controversy revolved around whether divorce takes effect if the husband declares that when he pronounces the divorce of his wife at a future date his wife shall be divorced triply. Now, at a later date he does utter once the statement of divorce. Ibn Surayj and Ibn Taymiyya, among others, declared such a statement of divorce void and thus inoperable as ti involves circularity. Ghazāli held this view, but later changed his position on the issue and declared the divorce issuing from such statements valid. See 'Abdurraḥmān Badawī, Les Œuvres d'al-Ghazālī, 50-2, 207-9.

<sup>&</sup>lt;sup>2</sup> I am unable to find any reference to this treatise, which may, at any rate, have constituted part of a larger juridical work. For a list of such works, see Brockelmann, *Geschichte*, suppl. ii. 124-5.

<sup>249</sup> This he seems to have done in the work referred to in par. 248, n. 2, above.

In fact, it was established on the authority of the Lawgiver, may God praise him, that he said: 'The Qibla is between the East and the West.' Al-Tirmidhi reported this tradition to be sound.<sup>1</sup>

251. This is why the majority of scholars hold that the person performing prayer is under no obligation to infer the direction of the Qibla on the basis of the location of the North Pole and the North Star, or for that matter of any other location. The prayer of people in Syria will be valid so long as they pray with the West to their right and the East to their left. It is also impossible to determine, by means of arithmetic, the exact time the crescent moon appears. For even though they may know that the light emanating from the moon is a reflection of the sun, and that when the two bodies meet in conjunction the light of the moon disappears, and when it departs from the sun it regains light, the best they can do is to determine exactly, through arithmetic, the distance between the moon and the sun when the latter sets. This may be so if we assume the correctness of the calculations and their arithmetical mean. They call this 'the science of astrometry' ('ilm al-taqwim wal-ta'dil), because they calculate the median between the highest and lowest paths travelled by the stars. Even if we assume that they did manage to determine the moon's position at sunset, this would not prove that the crescent moon had been detected. Detection is a sensory matter and is affected by several factors, such as the clarity or density of the air, the high or low position of the star, and the strength or weakness of one's eyesight. There are those who cannot see the crescent, and there are others, with keener eyesight, who can.

252. This is why the ancient astrologers such as Ptolemy, the author of *Almagest*, and others have discussed nothing of these issues. Only later scholars such as Kūshyār al-Daylamī<sup>1</sup> and the likes of him discussed them. When they saw that the Law commands the

<sup>250 &</sup>lt;sup>1</sup> Tirmidhī, Sahīh, i. 70. The thrust of this hadīth is that the prayer of Muslims is valid as long as they pray while facing more or less the direction of the Qibla. Identifying the precise geographical location of the Qibla constitutes no condition for the prayer's validity.

**<sup>251</sup>** Dozy defines taqwīm and ta'dīl as the science treating of the 'determination de la position des astres pour un temps donne' (Supplement, ii. 103, 427, s.vv. '-d-l and q-w-m). For the calculation procedures of taqwīm and ta'dīl, see Battānī, al-Zīj al-Sābi', 108 ff.

<sup>252 &</sup>lt;sup>1</sup> Probably Küshyār b. Labbān al-Jīlī, an astronomer and mathematician who died sometime in the first quarter of the fifth/eleventh century. See Brockelmann, Geschichte, i. 252-3; suppl. i. 397-8; Sezgin, Geschichte, vi. 246-9.

detection of the crescent, they wished to determine this by means of arithmetic, and thus they went astray and led others into error. Those who argue that the crescent cannot be seen at twelve or ten degrees, etc., have gone wrong, for one person may detect it at a smaller number of degrees while another cannot do so at the same degree. They have resorted neither to reason nor to revelation, and because of this the eminent scholars in their field have disavowed their views.

253. Ibn Taymiyya then said: the validity of the form of a syllogism is irrefutable, but we shall make clear that it does not lead to knowledge of things in the external world, and that their stipulation of two premisses, no more and no less, is erroneous. Even if the syllogism yields certitude, it cannot alone lead to certainty about things existing in the external world. We argue that in the syllogistic form the conclusion is undoubtedly certain if the subject-matter is certain. If we say: 'Every A is B', and 'Every B is C', there will be no doubt that, if the premisses are certain, this combination will result in the certain conclusion that 'Every A is C'. But it must be maintained that the numerous figures they have elaborated and the conditions they have stipulated for their validity are useless, tedious, and prolix. These resemble the flesh of a camel found on the summit of a mountain; the mountain is not easy to climb, nor the flesh plump enough to make it worth hauling.

254. When the subject-matter is valid, it is possible to cast it into the natural (fitri) first figure. The rest of the figures are not needed, for their validity is proven only when they are converted to the first figure either through proving the absurdity of the contradiction in the reductio ad absurdum argument, or through conversion ('aks almustawi) and full contraposition ('aks al-naqid). For the affirmation of one of two contradictories entails the negation of the other if all possibilities of contradiction have been taken into account. Thus, from the validity of a proposition they infer the invalidity of its contradictory as well as the validity of its conversion and contraposition. The mind's conception of the form of an inference resembles a person's calculation of the number of slaves and the property he owns. Natural intelligence can form a concept of a valid

<sup>253 &</sup>lt;sup>I</sup> This is Suyūtī's statement, by which he intimates the return of Ibn Taymiyya to the treatment of logic after having digressed to discuss metaphysical and other matters in al-Radd, 265-93.

<sup>254 &</sup>lt;sup>1</sup> For these see par. 124, n. 2, above.

syllogism without learning how to do so. Just as people make arithmetical and other calculations, they, through their natural intelligence, think in accordance with the three modes; namely, subsumption, concomitance, and division.<sup>2</sup> The logicians may accept these modes.

255. To sum up, we do not deny that a syllogism leads to certitude when its subject-matter is certain. But we maintain that a logical syllogism is not needed to arrive at certitude, for it may be reached without a syllogism. Therefore, the attainment of certitude does not hinge on a syllogism.

256. Furthermore, the apodictic subject-matters they have spoken of 1 do not lead to knowledge of existing objects, and thus they do not yield any result that suits the soul. In fact, the knowledge of the extramental reality, as it is, represents the same kind of knowledge that is arrived at by means of analogy. Therefore, no knowledge is possible through a logical categorical syllogism—which they call demonstration—without its being also possible through analogy, which they have deemed to be weak. A syllogism must include a universal premiss; but the universality of the proposition cannot be known unless it be ascertained that all the particulars under that universal share one common factor, and this is done by means of analogy. We should like to explain this in the following considerations:

257. First, they have limited the apodictic subject-matters to those types with which they are familiar:

258. The first of these are sensory matters (hissiyyāt). It is known that through the senses universal and general matters cannot be perceived. Sensory matters do not lend themselves to universal and general propositions which can serve as premisses in apodictic demonstration. In their example 'Fire burns', etc., they do not know for certain the universality of this proposition. All they rely on is experiment and custom, which are of the same kind as analogy. If the universality of the proposition is known on the basis of the fact that fire possesses a power to burn, then the knowledge that every fire necessarily possesses this power is a universal judgement as well.

<sup>&</sup>lt;sup>2</sup> Here, subsumption (tadākhul) stands for the categorical syllogism, concomitance (talāzum) for the conditional syllogism, and division (taqsīm) for the alternative-disjunctive syllogism.

<sup>256</sup> See sources cited in par. 204, n. 2, above.

<sup>257</sup> See sources cited in par. 204, n. 2, above.

Someone may argue: 'The stuff of fire must include this power, and whatever lacks this power is not fire.' Though this statement may be true, it does not conclusively ascertain that all things possessing this power will burn everything they encounter, albeit this is usually the case. [The burning ability of fire] is the object of analogy, categorical syllogism, custom, and imperfect induction—that is, if we grant them this. But how could this be the case when it is known that fire does not burn salamander stone, hyacinth, and objects coated with manufactured material? I do not know of any universal proposition that is based on sense perception which cannot be refuted, though universal propositions are not sensory. A sensory proposition would be of the type 'This fire burns', since only particular things are perceived through the senses.<sup>1</sup>

259. Concerning rational judgement, they argue that when the mind observes particulars, it becomes ready to be effused by a universal, general proposition. This is known to be of the same genus as analogy. The universality of such a judgement cannot be trusted if the general judgement is not known to be concomitant with the factor common to all particulars. But if the general judgement is known to be concomitant with the common factor, it will be so known in all the particulars. Therefore, the knowledge of such particulars will not depend on concomitance, though intelligent people have agreed that none of the universal propositions derived on the basis of custom are beyond refutation.

260. The second are the inner senses, such as one's perception of one's own hunger, pain, or pleasure. All these are particulars, and, unlike the case with the apprehension of certain external sensory matters such as the sun and the moon, people do not all share in perceiving the very same particulars. In the inner senses there is a certain particularity in the perceiving person and the object perceived, a particularity which is not found in external sense perception. Should all people share in perceiving the very same particulars, then this would resemble custom ('ādiyyāt). But the logicians have proffered

<sup>258 1</sup> Cf. Rāzī, Muhassal, 9-13; Tūsī, Talkhīs al-Muhassal, 9 ff.

<sup>260 1</sup> For a more detailed statement, see par. 302 below.

<sup>&</sup>lt;sup>2</sup> Custom or customary knowledge is the perception by the generality of people of a habitual course of events or a habitual matter, such as the knowledge that a particular mountain which they have observed has not transformed into gold. Some philosophers consider this category to belong to intuitive perception. Further on the concept of 'āda in theology, see Wolfson, *Philosophy*, 544-51. See also Harawī, *Durr*, 312; Jurjanī, *Ta'rīfāt*, 127, s.v. 'āda.

no proof to the effect that minds are necessarily equal under these circumstances and that the parts of the rational soul (al-nafs al- $n\bar{a}tiga$ )<sup>3</sup> are equal to each other.

261. The third are experiential matters (mujarrabāt), which are all particular, for experience decides only in particular matters. Such also are the multiply transmitted reports (mutawātirāt) which are known through the senses, such as that which is heard or seen. What is heard is a particular statement, and what is seen is a particular body, a particular colour, act, or matter. As to intuitive matters (hadsiyyāt), if they are considered certain, they are like experiential matters. However, the difference between intuitive and experiential matters does not relate to the general and the particular; the latter relate to the very acts of the experiencers, whereas the former are about their acts. Some people call both experiential matters<sup>2</sup> and are thus left only with first principles, which are rational axioms (badīhiyyāt 'aqliyya). The universal first principles are absolute propositions concerning numbers, quantities, etc.; for example, one is half two, things that are equal to one thing are equal to each other, and so on. These are in the mind and do not exist as universals outside the mind.

262. It is therefore obvious that the universal, demonstrative propositions which they employ in their syllogisms and which must, in so far as universality is concerned, be considered certain, cannot be used for matters existing in the external world; rather, they are used with regard to matters in the mind. Thus, the logicians cannot discover matters in external existence through the demonstrative syllogism; and that is what we sought to prove.

263. Accordingly, they did not have the knowledge to enumerate exhaustively the categories of existence. Whereas Aristotle enumer-

experience for inductive support while the latter leads to knowledge at first occurrence.

<sup>&</sup>lt;sup>3</sup> The parts of the rational soul are three, each representing a stage in the spiritual development of the human soul: first, the peaceful soul (al-nafs al-mutma'inna), which is righteous and not susceptible to passions and desires; second, the self-accusing or self-blaming soul (al-nafs al-lawwāma), which arises upon the departure from the path of rectitude; finally, the commanding soul (al-nafs al-ammāra), which is not only susceptible to passions, but is also ruled by base desires. See Jurjānī, Ta'rīfāt, 218, s.v. al-nafs al-nātiqa; Sheikh, Dictionary, 136-8, s.v. al-nafs al-ammāra, al-nafs al-lawwāma, and al-nafs al-mutma'inna.

 <sup>261</sup> On mutawātirāt, see pars. 16, n. 2, and 137, n. 3, above.
 See e.g. Ghazālī, Mi'yār, 188-92, where he in effect subsumes intuitive propositions under the experiential category. Rāzī, Tahrīr, 167, remarks that the difference between the two types of propositions is that the former requires the repetition of

ated the kinds of existents in the ten categories—substance, quantity, quality, place, time, position, act, passion, possession, and relation<sup>1</sup>—they agreed that there is no way to establish that these categories are exhaustive.

264. The second consideration. We should argue that if a syllogism must encompass a universal proposition, that proposition must revert to something that is known through means other than the syllogism. Otherwise, it would entail circularity and infinite regress. Since it follows from their views that universal propositions must be arrived at by means other than the syllogism, we say the following: the natural intelligence's apprehension of the existing particulars subsumed under a categorical proposition arrived at by means other than the syllogism is stronger than its apprehension of that categorical proposition; for example, one is half two; one body cannot [simultaneously] exist in two places; or contraries cannot be reconciled. The knowledge that this particular one is half two is instinctually stronger than the knowledge that every one is a half of every two. The same goes for any given number.

265. Now, what is intended by these universal propositions is to arrive at knowledge of things existing in the external world or at mental estimates (muqaddarāt dhihniyya). The latter are of little use. As to the former, however, the knowledge of their being particular things existing extramentally is more manifest and stronger than the knowledge of their being particulars through a categorical syllogism which entails them. Thus, the syllogism does not yield much benefit, and in fact represents unduly protracted reasoning. When it is used, it is for the purpose of addressing those who are pertinacious or those who are in error; they will be given an example, and a universal premiss will be presented to them in order to rebut their error and pertinacity. But there is no need for a syllogism in the case of those whose natural intelligence is sound.

266. As to their statement that no two contraries can be reconciled, one will know, before formulating in the mind the universal proposition 'No two contraries can both be true', that any two things which are contrary to each other cannot both be true. One will also know that a certain body cannot simultaneously exist in two different places

<sup>263 &</sup>lt;sup>1</sup> Aristotle, Categoriae, 1<sup>b</sup>25-2<sup>a</sup>4; Ibn Sīnā, Najāt, 116-17; Ibn Rushd, Talkhīs Mantiq Aristū, i. 17-55; Ibn Tumlūs, Madkhal, 42 ff.; Sheikh, Dictionary, 132, s.v. almaqūlāt al-ashr.

<sup>265</sup> i.e. things that exist in the mind.

before one knows that 'All bodies cannot simultaneously exist in two places'. Examples of this kind are numerous. Thus, there exists no particular that one seeks to know through these universal propositions without its being known prior to these propositions: such universal propositions are not needed in order to know these particulars. Through universals one knows the resemblances of these particulars which are in the mind but which do not exist extramentally.

267. Things existing extramentally may be known without a syllogism. If it is claimed that certain people arrive at the knowledge of some extramental particulars by means of a syllogism, this syllogism will be based on analogy, whose certitude they reject. Thus, they waver between two matters; if they admit that analogy, like syllogism, is divided into that which is probable and that which is certain, then their distinction between syllogism and analogy will be void. If, on the other hand, they argue that there is a difference between the two, and that, unlike analogy, categorical syllogism yields certitude, then we reject their argument  $(muni'\bar{u})^1$  because it does not rest on evidence, and we demonstrate to them that certitude is not attainable in these matters unless it is [first] attained by means of analogy. The unknown particulars in the external world will be known by drawing an analogy to the particulars that are known. No man of sound mind will dispute this truth. Indeed, this is one of the most distinctive characteristics which distinguishes the intellect from sense perception, for sense perception apprehends only particulars whereas the intellect apprehends particulars in a universal and absolute manner, albeit this occurs through analogy. Moreover, the intellect apprehends particulars in their universality without being in possession of all of them; for they become universal in the intellect after the intellect has formed a concept of a certain number of them. But when the intellect is separated from individual particulars by a long lapse of time, it will commit frequent errors by formulating excessively general or unduly restrictive judgements. This often happens to people when they think that their universal propositions are valid, though upon investigation this turns out not to be the case. They form a concept of a thing in their intellects, and the object of their conception is rationally tenable. Accordingly, they base their arguments on it and

<sup>267 &</sup>lt;sup>1</sup> Man' (passive muni'a) constitutes the refusal of the opponent's argument on the ground that it is not supported by evidence (dalīl). See Jurjānī, Ta'rīfāt, 207, s.v. mumāna'a. For a detailed discussion of man' in the context of dialectic, see Tūfī, 'Alam al-Jadhal, 58 ff.

think that they have discoursed on the basis of quiddity abstracted in itself (mujarrada bi-nafsiha) in so far as it is a quiddity qua quiddity, without its being subsistent extramentally or in the mind.<sup>2</sup> Thus, they say: 'man qua man; existence qua existence; blackness qua blackness', etc.

268. They also think that this quiddity, which they have abstracted from all negative and affirmative conditions, is realized extramentally in this abstracted form. This, however, is a mistake, just like the mistake committed by their predecessors concerning the abstraction of numbers, of Platonic Forms, and of other things. These abstractions are only in the mind, and not everything that the mind postulates will exist extramentally; this is known as mental contingency (imkān dhihni). Contingency is of two types: [first,] mental, namely, when a thing is exposed to the mind but the mind does not know it to be impossible; it holds the thing to be possible not because it knows that that thing is possible but rather because it does not know it to be impossible, although [the existence of] the thing may be impossible in the extramental world; and [second,] extramental, namely, that [the existence of] the thing is known to be possible in the extramental world. This knowledge obtains when it is known that the thing or its like exists in the extramental world; or when it is known that what is less likely to exist does exist extramentally. Should that which is less likely to admit of [extramental] existence exist or be capable of [such] existence, then what is more likely to exist does a fortiori exist.

269. This is the method of the Quran in demonstrating the contingency of Resurrection. The Quran demonstrates this contingency in places by speaking of those whose lives God took and thereafter resurrected, as He spoke of the folk of Moses who queried: 'Show us God plainly', whereupon God said: 'And even while you gazed, the lightning seized you, then We revived you after your death.' He also spoke of 'those who went forth from their habitations in the thousands, fearing death, and God said to them: Die, and then He brought them back to life'; and of 'him who was passing by a

<sup>&</sup>lt;sup>2</sup> See e.g. Ibn Sīnā, Shifā': Madkhal, 13, 34, 37, and passim; Tūsī, Sharḥ al-Ishārāt, i. 202-3, 217; Marmura, 'Avicenna's Chapter on Universals', 38 ff.; and Introduction, Part I, Sections 2-3, above.

<sup>269 &</sup>lt;sup>1</sup> Quran, 4: 153. <sup>2</sup> Quran, 2: 55-6. <sup>3</sup> Quran, 2: 243.

village... and God made him die a hundred years, then he brought him back to life';<sup>4</sup> and of Abraham when he said: 'Lord! show me how You give life to the dead...',<sup>5</sup> and so on to the end of the narrative. The Quran also spoke of Christ, who, with the permission of God, used to resurrect the dead, and of the People of the Cave who were resurrected after three hundred and nine years.<sup>6</sup>

270. At other times the Quran proves the contingency of Resurrection by means of [comparing] primal genesis with Resurrection, the latter being easier than creation, as in His statement: 'If you are in doubt concerning the Resurrection, then lo! We have created you from dust';¹ and His statements: 'Say: He shall revive them who originated them the first time';² 'Say: He who created you at first';³ 'And it is He who originates creation, then brings it back again, and it is very easy for Him.'4

271. At yet other times, the Quran proves Resurrection through the creation of the heavens and the earth, for their creation is greater than the restoration of man, as evidenced in His question: 'Have they not seen that God who created the heavens and earth, not being wearied by creating them, is able to give life to the dead?' At still other times, the Quran proves the contingency of Resurrection through the creation of plants, as in His statement: 'It is He who sends the winds, bearing good tidings [before His mercy, till when they are charged with heavy clouds, We drive them to a dead land, and therewith send down water, and bring forth therewith all fruits]. Even so We shall bring forth the dead.'2

272. It is then clear that the truth about rational evidence upheld by the leading theologians and philosophers concerning metaphysical enquiries has been revealed in the Glorious Quran in a more eloquent and perfect form, it being free from the numerous errors overriding their doctrines. For their errors in metaphysics are very many, and they are here more often misguided than not, and more ignorant than knowledgeable. This is why towards the end of his life Abū

<sup>&</sup>lt;sup>4</sup> Quran, 2: 259.

<sup>&</sup>lt;sup>5</sup> Quran, 2: 260.

<sup>&</sup>lt;sup>6</sup> See Quran, 18: 26.

<sup>270 1</sup> Quran, 22: 5.

<sup>&</sup>lt;sup>2</sup> Quran, 36: 78.

<sup>&</sup>lt;sup>3</sup> Quran, 17: 51.

<sup>&</sup>lt;sup>4</sup> Quran, 30: 27.

<sup>271 1</sup> Quran, 46: 33.

<sup>&</sup>lt;sup>2</sup> Quran, 7: 57.

'Abd Allah al-Rāzī remarked in his work Aqsām al-Ladhdhāt¹ that 'I have contemplated the theological schools and philosophical methods, but found them incapable of healing the soul or quenching the thirst. I found the best of paths to be that of the Quran; it is more explicit in affirmation—"The Beneficent, who is established on the Throne";² "Unto Him good words ascend"³—and more explicit in negation—"Like Him there is naught";⁴ "They cannot compass it in knowledge."⁵ He who has had my experience would know what I know.'

273. What we mean is that extramental contingency is known through existence, and not merely on the grounds that the impossibility of existence cannot be ascertained—as a group of scholars, amongst them Āmidī, argues. Even less valid than affirming extramental contingency through mental contingency is the philosophers' view, such as that of Ibn Sīnā, that extramental contingency may be established merely through the possibility of forming a concept of it in the mind. Furthermore, when they attempt to prove an intelligible, extramental existent which can in no way be an object of sense perception, they adduce the concept of the universal, absolute man, which includes the individuals existing in the external world. But this leads only to the possibility of the existence of these intelligibles in the mind, for the universal cannot exist *qua* universal except in the mind. How different is the philosophers' method of proving extramental contingency from that of the Quran!

274. By means of such false methods the philosophers wish to drive people away from the certain knowledge and rational demonstration that have become innate to them, as well as from divine reports revealed through the messengers about God and the Day of Judgement. They also wish to construct of such false propositions and corrupt illusions rational principles by means of which they can oppose not only what God has sent down through the messengers and the signs (āyāt) He has revealed in His Books, but also the

<sup>272 &</sup>lt;sup>1</sup> This work of Fakhr al-Dīn al-Rāzī does not seem to be extant. Ibn Qayyim al-Jawziyya reports it as one of the last treatises that Rāzī wrote. Ibn Qayyim cites Rāzī as saying that the ultimate source of guidance is not speculative thought but the Quran. See Ijtimā' al-Juyūsh, 214-15. See also Muwāfaqat Ṣahīh al-Manqūl, i. 92-3.

<sup>&</sup>lt;sup>2</sup> Quran, 20: 5.

<sup>&</sup>lt;sup>3</sup> Quran, 35: 10.

<sup>&</sup>lt;sup>4</sup> Quran, 42: 11.

<sup>&</sup>lt;sup>5</sup> Quran, 20: 110.

<sup>273 &</sup>lt;sup>1</sup> Cf. Ibn Sīnā, Shifā': Madkhal, 65-72.

natural intelligence which God bestowed on His subjects and the foundations of the indubitable rational proofs. With their principles they have corrupted both the rational and religious sciences. Rational knowledge is based upon sound and healthy natural intelligence, and religious knowledge upon the belief in the prophets, may God praise them. The prophets, may God praise them, have perfected both for people: they have introduced people to the rational indicants by means of which matters that can be attained through reflection and reasoning are apprehended, and they have communicated to people the invisible details that they are unable to perceive through their own reflection and reasoning.

275. The teachings of the prophets, may they be praised, are not confined only to revelation, as many people think. Rather, the prophets have elucidated rational demonstrations through which divine knowledge is attained, knowledge that these philosophers have never attained. The prophets' teachings, may God praise them, are thus inclusive of both rational and revelational indicants, unlike the teachings of those who disagreed with them, teachings which lead to neither rational nor revelational indicants. Their unjustifiable arrogance is another matter besides. God, the Exalted, said: 'Those who dispute concerning the signs of God, without any authority having come to them, in their breasts is only pride, that they shall never attain. So seek thou refuge in God; surely He is the Allhearing, the All-seeing.' He also said: 'Those who dispute concerning the signs of God, without any authority having come to them, very hateful is that in the sight of God and the believers; so God sets a seal on every heart proud, arrogant', and 'When their messengers brought them the clear signs, they rejoiced in what knowledge they had, and were encompassed by what they mocked at.'3 Statements like these are many in the Quran. About this matter I have written the treatise Daf' Ta'ārud al-Shar' wal-'Aql. However, since they have formed a concept in their minds of what they have imagined to exist in the external world, most of their knowledge in metaphysics and mathematics is based on this concept.

<sup>275 1</sup> Quran, 40: 56.

<sup>&</sup>lt;sup>2</sup> Quran, 40: 40.

<sup>&</sup>lt;sup>3</sup> Quran, 40: 83.

<sup>&</sup>lt;sup>4</sup> The correct title is Dar' Ta'ārud al-'Aql wal-Naql, which is the same as Muwāfaqat Sahīh al-Manqūl li-Sarīh al-Ma'qūl. An edition bearing the former title was published in Cairo in 1971. See Brockelmann, Geschichte, suppl. ii. 122, and the editors' introduction to Muwāfaqat Sahīh al-Manqūl, i. 55.

276. When people knowledgeable of the truth ponder the philosophers' various sciences, they will not find them knowledgeable of things existing in the external world, except for the category of what they call physics and what is relative to it in the way of mathematics. Mathematics abstracted in the mind is a judgement of mental estimates (maqādīr dhihniyya) that have no existence outside the mind. When what they call the science of metaphysics is pondered, one will find in it no knowledge of a thing existing in the external world. They have formed concepts of matters existing in their minds but which have no reality in the external world. Thus, the ultimate aim of their speculation and the end of their philosophy and wisdom is the absolute, universal existent which is conditioned by a negation of all existential attributes.

277. We mean that in demonstrative enquiries and rational matters they often make claims on the basis of what they posit in their minds. They maintain: 'We discuss [only] universal matters and purely rational issues.' But when something is mentioned to them, they answer: 'We would rather discuss more general things, and discuss truth qua truth', and so on. But then they will be requested to substantiate that what they have mentioned does exist in the external world. They will be asked: 'Explain what thing this is!' Their ignorance will then become obvious. It will also become obvious that what they hold are things that exist in the mind and have no reality in external particulars. For instance, they will be asked to give an example of the universal; but examples are particular matters. When they fail to do so and say 'we discuss [only] universal matters', one should know that they speak without knowledge; they speak about things they do not know to have an existence in the external world. Rather, they speak about things which do not, or cannot, have knowable existence in the external world. Otherwise, if the knowledge of externally existing matters is universal, then the objects of this knowledge must be established in the external world. Al-Khusrawshāhī<sup>1</sup> was one of their leaders and one of the leading followers of [Fakhr al-Dīn] al-Rāzī. He used to remark: 'We could not find anything but these universals.' He would be puzzled and

<sup>277 &</sup>lt;sup>1</sup> Shams al-Dîn Abū Muhammad 'Abd al-Hamīd b. Yūnus b. Khalīl al-Khurawshāhī al-Tabrīzī (d. 652/1254) was a Shāfi'ī jurist and theologian, and a student of Fakhr al-Dīn al-Rāzī. Al-Subkī reported his name to be al-Khurawshāhī, while Ibn al-'Imād gave it as al-Khusrawshāhī, after Khusrawshāh, a village near Tabrīz. See his biography in Subkī, *Tabaqāt*, v. 60, and Ibn al-'Imād, *Shadharāt al-Dhahab*, v. 255-6.

entertain doubts, and would repeatedly say: 'By God, I do not know what I believe!'

278. What we mean to say is that if the universals, which they uphold, constitute knowledge, then it is knowledge arrived at by analogy and is in no way dependent upon logical, categorical syllogisms. The particulars which are subsumed under that which they claim to be established through a syllogism can more easily be known without that syllogism. Deducing these particulars through the syllogism, which they call demonstration, is an inference which proceeds from the more known to the less known. But in the theory of definition they denounce defining that which is not known by means of what is known. In the theory of demonstration doing so would be even worse, for in demonstration all that is needed is to explain, define, and explicate what is indicated. If the latter is more clear [than the indicant], then the inference will proceed from the unknown to the known!

279. Ibn Taymiyya said: the philosophers who uphold demonstrative logic—which Aristotle devised—and physics and metaphysics, which are associated with it, are not a unified group; they are of different persuasions, and God alone can enumerate the disagreements and divisions amongst them! Their disagreements and divisions are far greater than those existing within any one community, such as that of the Jews or Christians. The further these philosophers are from following the messengers and revealed scriptures, the more divided and disagreed they are. They are more misguided than the Jews and Christians, as has been reported in the tradition narrated by Tirmidhī from Abū Umāma on the authority of the Prophet, may he be praised, who said: 'No nation goes astray after having been rightly guided without having been given to disputes." The Prophet then recited God's statement: 'They raise not the objection save to dispute; nay, but they are a contentious folk', for nothing decides disputes among people except a revealed book or a divine prophet. God, the Exalted, said: 'Mankind were one community; then God sent forth the prophets as bearers of good tidings and as warners, and He sent down with them the Book with the truth, that He might 

<sup>3</sup> Quran, 2: 213.

<sup>279 &</sup>lt;sup>1</sup> Tirmidhī, Saḥih, ii. 318 (commentary on Surat al-Zukhruf, Quran, 43).
<sup>2</sup> Quran, 43: 58.

He also said: 'We verily sent Our messengers with clear proofs, and revealed with them the Scripture and the Balance, so that mankind might uphold justice', 4 and 'If you should quarrel about anything, refer it to God and the Messenger'. 5

280. In His Book God elucidated, by giving examples and rational inferences, the means by which truth can be distinguished from falsehood. He also commanded togetherness and harmony, and forbade division and disagreement. He spoke of the recipients of mercy that they do not disagree amongst themselves; He said: 'But they continue in their differences excepting those on whom thy Lord has mercy.' This is why the people who follow the Messenger most closely disagree among themselves less than all other groups who claim to adhere to the Sunna. All those who are close to the Sunna disagree among themselves less than those who are far from it, such as the Mu'tazilīs and the Rāfidis, whom we find to be in disagreement amongst themselves more than any other group.

281. No one, on the other hand, can enumerate the differences among philosophers. In his treatise al-Maqālāt, al-Imām Abū al-Ḥasan al-Ash'arī discussed the doctrines of non-Muslims and gave an account of the great majority of their views, except for those of Fārābī and Ibn Sīnā.¹ Likewise, in his treatise al-Daqa iq, al-Qādī Abū Bakr Ibn al-Ṭayyib [al-Bāqillānī] refuted the philosophers and astronomers, and found the Arab theologians' logic superior to that of the Greeks.² So did the Mu'tazilī and Shī'ī theologians³ and others when they refuted the philosophers. Al-Ghazālī also wrote the treatise al-Tahāfut to refute them.

282. Muslim scholars continue to write in refutation of the philosophers' logic, and to expose the errors in their discourse concerning both definition and syllogism. They also continue to expose the philosophers' errors in metaphysics and other matters. No Muslim scholar has attached importance to their method; in fact, the Ash'arīs, Mu'tazilīs, Karrāmīs, 1 Shī'īs, and speculative thinkers in other groups

<sup>&</sup>lt;sup>4</sup> Quran, 42: 25. <sup>5</sup> Quran, 4: 59.

<sup>280 1</sup> Quran, 11: 120.

<sup>281 &</sup>lt;sup>1</sup> It is to be noted that Ash'arī died in 330/941, Fārābī and Ibn Sīnā in 339/950 and 428/1037, respectively.

<sup>&</sup>lt;sup>2</sup> For Bāqillānī's work, see par. 89, n. 3, above.

<sup>&</sup>lt;sup>3</sup> Such as the Mu'tazilis al-Nāshi' al-Akbar Ibn al-Shirshīr and Abū Hāshim al-Jubbā'ī and the Shī'ī Nawbakhtī. See pars. 89, n. 4, and 282, n. 4, and Introduction, Part II, above.

<sup>282 &</sup>lt;sup>1</sup> For the Karrāmīs, see par. 18, n. 1, above.

have condemned their method and exposed its falsehood. The first scholar to have mixed their logic with Islamic principles is  $Ab\bar{u}$  Hāmid al-Ghazālī.<sup>2</sup> Muslim scholars have since discussed logic<sup>3</sup> at too great a length to be mentioned here. The refutation of the logicians is set forth in many a theological work. In  $Ab\bar{u}$  Muḥammad al-Hasan b. Mūsā al-Nawbakhtī's work  $al-\bar{A}r\bar{a}$ '  $wal-Diy\bar{a}n\bar{a}t^4$  there is a useful chapter (fasl) of such refutation. Having discussed Aristotle's logical method, he said:

Some Muslim theologians have objected to these principles of logic. They have said: 'The statement of the logician that a syllogism cannot be formed of a single premiss is mistaken, because if the reasoner wishes to infer that "Man is substance" he can infer this very conclusion—without producing two premisses—by arguing that "the evidence that man is substance is that man is susceptible to contrary [qualities] at various times". The reasoner does not need a second premiss, that is to say that "everything susceptible to contraries at various times is substance", because the particular is subsumed under the general. Whichever of the two he uses to draw the inference will render the other needless. Having observed an effect one infers that there is a cause, and having observed writing that there is a writer, without needing two premisses to infer that this is the case.'

The logicians have answered: 'We argue that there must be two premisses. When only one of the premisses is mentioned, it is because the other, being known to the reasoner, is left out, as he has no need for it.'

We reply: 'We do not find two universal premisses through which the validity of a conclusion is inferred; for when the reasoner says "substance is the attribute of all living creatures, and life is the attribute of all humans", the conclusion will be "substance is the attribute of all humans". The statement "Substance is the attribute of all living creatures" is equal in the mind to the statement "Substance is the attribute of all humans". In practical matters they will not find the conclusion to depend on two self-evident

<sup>3</sup> Literally: 'discussed it' (takallama fihi). The pronominal suffix in fihi may refer to Ghazālī, but it makes better sense to take logic as the referent.

<sup>&</sup>lt;sup>2</sup> See pars. 184-5 above.

<sup>&</sup>lt;sup>4</sup> Abū Muhammad al-Hasan b. Mūsā al-Nawbakhtī (or Abū Muhammad al-Hasan b. Muhammad al-Nawbakhtı) was an Imāmī theologian and philosopher (died before 310/922). See *Encyclopaedia of Islam*, iii/2. 887 (no. 3), s.v. 'Nawbakhtī'; Ziriklī, A'lām, ii. 224; Ritter's introduction to *Firaq al-Shī'a*, pp. hā'ff. On his name, see Amīn, A'yān al-Shī'a, v. 271. s.v. 'Hasan b. Muhammad'. Brockelmann, Geschichte, suppl. i. 319, mistakenly identifies al-Ārā' wal-Diyānāt with another of Nawbakhtī's works, *Firaq al-Shī'a*. The passage quoted by Ibn Taymiyya in this paragraph, for instance, is not to be found in the latter work. In his *Dhari'a*, i. 34–5, Tihrānī distinguishes between the two works and reports on the authority of Ibn al-Nadīm that Nawbakhtī did not complete al-Ārā' wal-Diyānāt. See Ibn al-Nadīm, *Fihrist*, 251–2; and Introduction, Part II, above.

premisses. And since this is the case, one of them will suffice.' We also respond to them: 'Show us two primary premisses which do not presuppose a demonstrative syllogism, and by means of which a disputed matter can be settled, while at the same time this matter can be apprehended in the intellect prior to the conclusion. Should you not be able to find such premisses, your claim will be invalidated.'

I have asked more than one of their leaders to show me this, but they could not. What Aristotle discussed is neither found in external existence nor is it known.

As for what Aristotle maintained thereafter concerning the two remaining figures, neither of them is used according to [the principles] upon which he founded them. If they are validated through converting their two premisses so that they revert to the first figure, then what we have said about the first figure applies to them.

283. Ibn Taymiyya said: what Nawbakhtī meant was that all figures are validated through their conversion to the first figure, as has been previously explained. Therefore, figures and their validation are artificial and tedious, in addition to being needless. In the first figure the affirmative, negative universal, and particular propositions may all be used. But since the futility of the first figure has been established, the futility of what is derived from it and what cannot be validated without being converted to it is a fortiori established.

284. What is meant is that in this community—thanks be to God—there still are people who discern and refute the falsehoods found in the doctrines of those who are in error. As it is God who guides these people to do so, they agree—in opinion as well as in what is revealed—to accept truth and reject falsehood without mutual consultation or collusion. What these scholars have drawn attention to agrees with what we have pointed out, that the logical syllogism is dispensable and that its use causes excessive labour for the mind as well as much reflection and discourse to no avail.

285. The third consideration. Universal, general propositions do not exist in the extramental world as such. They are universal in the mind, not in particulars. Matters existing in the extramental world are particular; every existing thing has a reality particular to it, a reality which distinguishes it from other existing things that share no such reality with it. Therefore, it is not possible to infer the particularity of an individual existent through a syllogism. They admit this

<sup>284 &</sup>lt;sup>1</sup> On the significance of this, see par. 16, n. 2, above, and Hallaq, 'Inductive Corroboration', 9ff.

and maintain that 'the syllogism does not prove particular matters'. They express this by saying that 'it does not lead to particulars but only to universals'. Thus, the syllogism does not give knowledge of externally existing individuals. Every existent exists individually; and the syllogism therefore does not lead to the apprehension of the realities of existents. Instead, the syllogism leads to universal, absolute matters subsisting in the mind but not to those matters externally substantiated in individuals. None of the syllogistic arguments that scholars speak of and describe as demonstrative proofs of the existence of the Creator, may He be glorified, proves His individual essence; rather, they prove an absolute matter, and forming a concept of this absolute matter does not preclude another sharing in the concept. For if we say 'This is created' and 'Everything created must have a Creator', then this statement indicates an absolute, universal creator whose concept does not preclude another sharing in the concept. His individual essence is known through another means, which God implants in the heart. They do admit this because the conclusion does not go beyond the premisses, and the premisses must include a universal proposition. The universal, on the other hand, does not indicate an individual. And this is contrary to the signs that God mentions in His Book, such as His statement: 'Surely in the creation of the heavens and the earth, [and the alternation of night and day . . . and the turning about of the winds and the clouds compelled between heaven and earth, surely are signs for people who have sense]' and other statements that indicate individuals, such as the sun, which is the sign of daylight. The indicant is more general than a syllogism, for it may be used to infer a particular from a particular, such as inferring the location of the Ka'ba from the location of the stars and planets. Signs thus signify the Creator himself, may He be glorified, but not a factor common to Him and others. Everything other than He needs Him: therefore, from the existence of a thing, the existence of the individual essence of the Creator himself necessarily follows.

286. The fourth consideration. The middle term, which is repeated in a categorical syllogism—namely, 'alcoholic beverage' in the example 'Every intoxicant is an alcoholic beverage' and 'Every alcoholic beverage is forbidden'—is the locus (manāt) of the judgement (hukm) in analogy, which is the common factor bringing together

the original and the assimilated cases. The two inferences are identical; what is known through one is known through the other. Moreover, if the indicant is certain, then it will lead to certitude in both inferences, and if it is probable, then it will lead to probability in both.

287. The claim of the logicians and their followers that certitude obtains through a categorical syllogism and not through analogy is entirely false. It is a claim made by those who cannot conceive the true nature of the two inferences. One may know through revealed texts that all intoxicants are forbidden, as has been established in sound traditions. Since this is the case, no categorical syllogism or any other inference can be deemed to result in a judgement. Indeed, a judgement (hukm) may be known without an inference. Therefore, their doctrine that judgemental knowledge ('ilm tasdīqī) can be attained only by logical syllogism is false, as has previously been shown.

288. What we mean to do here is to show that the syllogism is of little or no use. For if what is to be proven is a universal propositione.g. 'All intoxicants are forbidden'-which is known to have been received from the Prophet, then the purpose is attained. Universal propositions received from the Prophet lead to the knowledge of divine matters, while those derived from the logicians' sciences are either susceptible to refutation (muntaqada),1 or equivalent to analogy, or do not lead to a knowledge of individual matters existing externally, but rather to mental estimates (mugaddarāt dhihniyya), such as arithmetic and geometry. For although a universal proposition deals with such estimates, the subsumption of a particular under the universal proposition is possible [only] by means of sense perception, not syllogism. Therefore, a syllogism cannot lead to the knowledge sought after; nor do the logicians have an exclusive possession of universal propositions. All nations, while taking analogy to be equal to the categorical syllogism, share the knowledge of these universals without the philosophers' logic occurring in their minds.

289. Proving the existence of the Creator and the truthfulness of prophecy does not depend on syllogistics, but rather on signs which

<sup>287</sup> See par. 190, n. 1, above.
2 See par. 52, n. 3, above.

<sup>288 &</sup>lt;sup>1</sup> That is, they are amenable to the proof that they are not universals by establishing that at least one of their members does not partake of the attribute (predicate) shared by all other members.

point to an individual who has no partner and who is known by means of necessary knowledge which requires no inference. What is attained by categorical syllogism is the same as that which is attained by analogy; namely, a universal matter which does not lead to the knowledge which is only particular to the Lord and the Messenger unless another [kind of] knowledge is joined to it.<sup>1</sup>

290. The fifth consideration. They argue that a categorical syllogism represents the knowledge that a judgement is affirmed of each member [of the class]. We reply: it is known—and they submit that the affirmation of some judgements of some of their members must be self-evident. For if the conclusion requires two premisses, the latter must ultimately rest on two premisses that can be known without two more premisses; otherwise, fallacious circularity or infinite regress will result. Now, if one assumes that two premisses are known through the same means, then no syllogism is required, as when one knows that 'Every man is an animal' and 'Every sensible animal moves by will'. Knowing that 'Every man moves by will' is more manifest and obvious. If the two premisses are known through one and the same inference, then once they become known, they need not be elucidated. However, if the means by which they become known are different, then one of the premisses that is not known must be elucidated, whereas the other which is known need not be. This is obvious in any given matter. Thus, it is clear that their logic is a waste of time, full of drivel, and exhausting for the mind.

291. The sixth consideration. Doubtless, the major premiss is either more general than, or equal to, the minor; but it is never more restricted than the minor. The conclusion is more restricted than, or equal to, the major, but more general than, or equal to, the minor; it is never more restricted than the minor. The senses first become cognizant of concrete particulars, and from these they proceed to universal propositions. One human after another is observed, and each one is seen to be sensible and to move by will, so we formulate the general statement 'All humans are sensible and move by will'. We hold that the universal proposition is known either through a syllogism or without a syllogism. But since in a syllogism there must be a universal proposition, it follows that such a proposition cannot

<sup>289 &</sup>lt;sup>1</sup> For Ibn Taymiyya's arguments for God's existence, see Hallaq, 'Ibn Taymiyya on the Existence of God'.

<sup>290 1</sup> See e.g. Rāzi, Tahrīr, 16 ff.; Ibn Sīnā, Najāt, 97.

be known without [another] universal proposition, and this entails either circularity or infinite regress. The issue then must ultimately rest with a general, universal proposition which is known axiomatically. To this argument they submit. But if the universal proposition can be known without the mediation of a syllogism, so can the other proposition. The characterization of a proposition as being selfevident or acquired is not a quality essential to the proposition, where all people should view it equally. Rather, it is a relative, relational matter depending upon one's own condition; for someone who knows the proposition without an indicant, the proposition will be self-evident; and for another who needs to reason and infer, it will be inferential, and so on with regard to other matters. Since universal propositions may be known without an indicant or a syllogism, and since such knowledge is not predetermined by the propositions themselves but rather hinges on the special conditions of each person, one cannot maintain that what Zayd has known by means of a syllogism others cannot know without a syllogism, for this would be a fallacious, negative statement.

292. The seventh consideration. From the foregoing it becomes obvious that a categorical syllogism can be converted into an analogy, and vice versa. Should someone ask: 'How do you know that the middle term entails the judgement?', we answer: the same way we arrive at the knowledge of the major proposition in a categorical syllogism. In the statement 'This agent exercises control over his acts, and whoever exercises control over his acts is knowing', whatever is said to be the middle term ('illa) of this universal proposition is also found in analogy. Furthermore, in the latter there exists an original case in which the judgement and the common factor are found, and on the basis of which an analogy may be drawn. In a categorical syllogism no particular through which the judgement is established is mentioned; and it is known, as sound-minded people agree, that the mention of the common universal together with some of its particulars is more firmly established in the mind than when it is mentioned without any particular.

293. This is why sound-minded people hold that the intellect is subordinate to sense perception, for while sense perception apprehends particulars, the intellect arrives through them at a common, universal factor. Universals occur in the mind only after compre-

<sup>292</sup> On the components of analogical inference, see par. 60, n. 5, above.

hending concrete particulars. Thus the knowledge of concrete particulars is one of the most important means to the knowledge of universals. Why then should the enumeration of particulars be a cause for weakening a syllogism? And why should deleting them cause a syllogism to be strengthened? The essence of the intellect is this, to apprehend universals through apprehending particulars. To deny this would be to deny the essence of the human intellect; and he who holds the universal without the enumeration of its particulars to be stronger than that universal which is stated together with examples of its particulars would be contentious.

294. Sound-minded people agree that adducing examples aids in the apprehension of universals, and that a situation in which an example is given is not the same as another in which no example is afforded. Those who ponder all the rationally based universals which people use in medicine, arithmetic, the crafts, trade, etc., will find this to be true. A person may reject a matter until he observes an instance of its genera, and only then does he acknowledge its species; from this he will derive a universal judgement. God, may He be glorified, thus said: 'Noah's folk denied the messengers' and 'The folk of 'Ād denied the messengers', etc. To each of these groups only one messenger was sent; but the philosophers rejected the genus of messengers—their rejection was not of one messenger in particular.

295. One of the greatest attributes of the intellect is the apprehension of similitude and difference. Once the intellect conceives of two similar things, it knows that they are alike, and thus it applies the same judgement to both of them, such as, for example, when it observes two pools of water, two piles of soil, or two portions of air. The intellect thus applies a universal judgement to the common factor. Applying the judgement to one of the concrete particulars and drawing an analogy between it and another similar particular while mentioning the common factor would give a better elucidation. This is [an example of] coextensive analogy. But when the intellect apprehends two different matters, such as water and soil, it differentiates between them. This is [an example of] coexclusive analogy.

296. What God commanded in His Book to be taken as an example

<sup>294 &</sup>lt;sup>1</sup> Quran, 26: 105. <sup>2</sup> Quran, 26: 123.

<sup>295 &</sup>lt;sup>1</sup> See par. 296, nn. 1-2, below.

(i'tibar)1 involves both coextensive and coexclusive analogy (qiyas tard wa-'aks).2 Since He annihilated those who disbelieved the messengers by their accusing the messengers of being liars, it was to be taken as an example that whoever does as they did will be afflicted with a punishment similar to that meted out to them, and will thus avoid accusing the messengers in order to avoid such a punishment; this is [a case of] coextensive analogy. It will also be known that those who do not accuse the messengers of lying are not so afflicted with punishment; this is [a case of] coexclusive analogy, which was intended to give an example of those who were punished. The gist of this analogy is that what is established in the assimilated case is the opposite of the judgement in the original case, not its equivalent. Both types [of analogy] involve reaching a lesson (i'tibār). God, the Exalted, said: 'In their stories is surely a lesson for men of understanding', and 'There has already been a sign for you in the two companies that encountered each other, one company fighting in the way of God and another unbelieving; they saw them twice the like of them, as the eye sees, but God confirms with His help whom He will. Surely in that there is a lesson for men possessed of eyes.'4 God, the Exalted, also said: 'God it is who has sent down the Book with the truth, and also the Balance (mīzān)',5 and 'Indeed, we sent Our messengers with the clear signs, and We sent down with them the Book and the Balance so that men may uphold justice.'6

297. Our forefathers have interpreted 'Balance' as meaning justice ('adl'), and some of them have understood it to be that by means of which things are weighed. The two meanings, however, are inseparable. God said that He sent down the Balance just as He

<sup>296 &</sup>lt;sup>1</sup> Quran, 59: 2, commands 'And reason (*i'tabirū*), o ye who have vision.' Generally speaking, *i'tibār*, means 'consideration' or 'to consider a matter duly'. The root '-b-r connotes the notion of crossing or passing from one side to another. Sunnī jurists and theologians took this verse, among others, as a divine sanction of juridical *qiyās*, since the purpose and function of *qiyās* is to proceed (pass = 'ubūr') from the known to the unknown. See e.g. Ibn Qudāma, Rawdat al-Nāzir, 255.

<sup>&</sup>lt;sup>2</sup> Unlike *tard* and 'aks employed in definitions (par. 15, n. 1) and in the verification of the 'illa (par. 61, n. 4), coextensive and coexclusive analogies are, respectively, the derivation from the original case of the conclusion (judgement = hukm) which is the effect of the 'illa (cause), and the derivation from the same case of the contrary of the conclusion which is the effect of the contrary of the 'illa. See Jurjānī, Ta'rīfāt, 123, 133-4, s.vv. tard and 'aks.

<sup>&</sup>lt;sup>3</sup> Quran, 12: 111.

<sup>&</sup>lt;sup>4</sup> Quran, 3: 13.

<sup>&</sup>lt;sup>5</sup> Quran, 42: 17.

<sup>6</sup> Quran, 42: 25.

revealed the Book, so that people may uphold equity (qist). The means by which similar qualities and measures are known belongs to the Balance. And so does that by which differences among different things are known. For instance, if we know that God, the Exalted, forbade date-wine on the grounds that it deters [people] from remembering God and from performing prayer, and that it sows the seeds of enmity and hatred among the faithful, and we observe that grapewine resembles date-wine in these respects, then the common factor namely, the middle term—is the Balance which God has revealed into our hearts so that we may weigh one [thing] and treat it as the other. By so doing we will not draw a distinction between two similar things. Valid inference thus stems from the justice God has commanded.<sup>2</sup> He who knows the universal without knowing the particular will have possession of the Balance only. The purpose of the Balance is to weigh those matters existing extramentally, for if it were not for their particulars the universals would not be considered just as without the weighable objects the Balance would be needless. There is no doubt that if a weighable object is weighed against another object by means of the Balance-which is the common, universal quality in the mind—such weighing will be more perfect than that in which any of the individual particulars present in the mind is weighed in the absence of another.

298. On the following grounds no intelligent man should think that the rational Balance which God revealed is Greek logic: first, God revealed the Balance together with His Books since the time of Noah, Abraham, Moses, and others, and before He created the Greeks. Greek logic was formulated by Aristotle three hundred years before Christ; so the ancient peoples could not have used it as a balance. Second, although our community, the followers of Islam, has been in the practice of employing rational balances, none of the forefathers had heard of this Greek logic. It appeared in Islam when Greek books (al-kutub al-Rūmiyya) were translated into Arabic during the reign of al-Ma'mun or thereabout. Third, subsequent to its translation, and after Muslim scholars had become familiar with it, they constantly censured and condemned it, and paid no attention to it or to those who applied it to their rational and religious in-

<sup>1</sup> See par. 296. nn. 4-5, above.

<sup>&</sup>lt;sup>2</sup> This and the following paragraphs constitute a response to such logicians as Ghazālı and Ibn Rushd who argued that logic and syllogistics are prescribed by the Quran. See par. 160, n. 1, above.

ferences (mawāzīn). No one should say that 'what is peculiar to their logic is merely their technical concepts; otherwise, rational thought is common to all peoples', because this is not so; in logic there are numerous false notions.

299. Furthermore, they have taken logic as the balance of rational balances, which are the rational inferences. They have also claimed that it is a canonical instrument which can, when properly used, protect the mind from erring in its thought. This, however, is not true, for if a balance were in need of another balance, the result would be infinite regress. Moreover, when natural intelligence is sound, it measures [things] by means of the rational balance, but if it is dull or defective, logic only renders it more so. One finds that the generality of those who apply logic to their sciences are bound to go astray, and they fail to produce rational indicants adequately. And if they do adequately produce rational indicants, they avoid considering them in terms of logic because logic is deficient and prolix. It prolongs the road; renders the clear ambiguous; and causes errors and fallacies. But when they relinquish natural (fitri) and rational knowledge of particulars in favour of categorical syllogisms—whose concepts, which they have coined, are ill defined and include both truth and falsehood—the result is so erroneous that it stands in contrast to what the balances are meant to be. Such balances then become iniquitous, not just. Those who use them are among the defrauders 'Who, when they measure against the people, take full measure but, when they measure for them or weigh for them, do scrimp.'2 Great is the difference, however, between scrimping material possession and scrimping the intellect and religion! Most of them, however, do not mean to be scrimpy, but they are like a person who has inherited balances from his father, and who uses them to measure for and against himself, but does not know whether they are just or iniquitous.

300. The Balance that God has revealed together with the Book is a just Balance which comprises the consideration of a thing in the light of its equivalent or opposite, so that similar things are treated as equivalent and distinct things as different. For God has instilled in the instincts (fitar) and intellects of His subjects the knowledge to discern what is similar and what is different. Should someone say: 'If this can be known through reason, why did God make it part of what

He revealed through the messengers?' We answer: he did so because the messengers imparted rational examples for people by means of which they apprehend similitude and difference. The messengers led and guided people to that by means of which justice may be achieved, and by which sound rational inferences, which are employed in religious enquiries, may be known. The prophetic sciences are not limited to transmitting revelation; and the messengers, may God praise them, have imparted examples and elucidated the rational sciences through which God's religion may, theoretically and practically, be perfected. Whenever natural intelligence veers away from religion, or whenever it is corrupted because it happens to adopt false opinions and heretical doctrines, the messengers' instruction and guidance will perfect this intelligence so that corruption is eliminated. The Quran and the traditions are replete with this: God shows the truths by means of rational inferences and examples, and He elucidates the methods by which two similar things are to be treated equally and two different things differently. He admonishes those who diverge from these [methods], as in His questions: 'Or do those who commit ill-deeds suppose that We shall make them as those who believe and do good works?" and 'Shall We then treat those who have surrendered as We treat the sinners? What ails you then, how you judge?'2 meaning that this is a wrongful, not a just, judgement, for it treats dissimilar things as similar. An indication of the treatment of similar things as equal are His questions 'Are your disbelievers better than those?'3 and 'Or did you suppose you should enter Paradise without there had come upon you the like of those who passed away before you?'4

301. We mean to say that the rational Balance, as God has mentioned in His Book, is the truth, and is not limited to Greek logic. The Balance is the sound inference which encompasses equating two similar things and differentiating between two dissimilar things, whether the form of that inference is a categorical syllogism or an analogy. But the forms of analogy are the source, and they are more perfect [than the syllogism]. The balance is the common factor, namely, the middle term (jāmi').

302. The eighth consideration. Just as they have confined certitude to the syllogistic form, they have limited certitude to the subject-

300 <sup>1</sup> Quran, 46: 21. <sup>2</sup> Quran, 68: 35-6. <sup>4</sup> Quran, 2: 214.

matter of the propositions they have upheld: [i.e.] the sensory, the a priori, the multiply transmitted, the experiential, and the intuitive. I It is known that there is no evidence in favour of rejecting other propositions. In addition to these, however, they also admit into sensory, rational, and other propositions what humans customarily share, and by so doing they fall into contradictions. All humans share in seeing and hearing certain things—they all see the sun, the moon, and the stars. But they see the genus of clouds and lightning, though what one group sees is not the very clouds and lightning the other sees. In the same manner they share in hearing the sound of thunder. But people do not share the hearing of each other's speech and sound; each group hears what other groups may not have heard. The same applies to most things that are visible. Not all people share the smell, taste, and touch of one thing in essence; for what one group smells, tastes, or touches is not [necessarily] the same as that which another group smells, tastes, or touches. The objects may be identical in genus but not in essence. Furthermore, concerning that which is known through multiple transmission, experience, or intuition, one group may know it by multiple transmission or by experience while another may not. But both groups may know something by genus, as when one group tries a medicine, and another group tries the genus of that medicine. Thus, they will share the knowledge of the genus of the thing experienced, albeit not the very thing itself ('ayn al-mujarrab).

and experiential and intuitive matters are particular to those who apprehend them, and therefore they do not constitute evidence against others [who were not subject to them]. One should answer them: the same applies to the objects of smell, taste, and touch. Indeed, more people share multiply transmitted traditions, since these are narrated by a large number of transmitters; therefore the number of hearers is greater, and they all share in hearing the tradition from a large number of people. This is different from what is perceived by the senses, for it is particular to the person who senses it. If someone maintains: 'I have seen, heard, tasted, touched, or smelled [suchand-such]', he cannot use this [experience] as evidence against another person. Even if we assume that a number of people have shared the

<sup>302 &</sup>lt;sup>1</sup> Rāzī, Taḥrīr, 166-7; Ghazālī, Mi'yār, 186-93; idem, Maqāsid, 102-4.

<sup>303 1</sup> See par. 43, n. 2, above.

perception of these sensory matters with him, it does not follow that still other people have sensed them; those who have not sensed them cannot apprehend them except by means of hearing about them (bitarīq al-khabar).

304. Most of their universal sciences dealing with the state of things existing in the external world derive from the knowledge of the regularity of these things; and this they call intuition. Most of their rational, natural, and astronomical sciences ('ulūm falakiyya), such as astrology ('ilm al-hay'a), belong to experiential matters, and these are not subject to demonstrative proof. That these natural bodies have been subject to experiment, and so has motion, is not known to most people except through verbal transmission, though multiple transmission (tawātur) in such matters remains scarce.

305. At best, an experiment may be cited on the authority of a physician or a mathematician. The best one can find is Ptolemy's statement: 'This is what so-and-so has observed', or Galen's statement: 'This is what I have experimented with', or 'So-and-so told me that he experimented with such-and-such'. In all of this there is no multiple transmission whatsoever. If we grant that someone other than he has also experimented with a certain thing, the report about the experiment would be transmitted through fewer than multiple channels. Most people do not experiment with those things on which the philosophers have experimented, nor do they apprehend through observation what the philosophers have apprehended. Even if the latter maintain that a group of people has observed [something], the report would, at best, be of the type of limited multiple transmission, which only a certain number of people (tā'ifa) transmit. Thus, those who claim that what has been multiply transmitted from the prophets does not constitute proof for them cannot use a similar multiple transmission as a proof against others. They should neither extol the science of astrology and philosophy, nor claim that it is a rational science arrived at through demonstration.

306. This is the condition of the most important foundation upon which their rational demonstration rests! What is one to think of metaphysics (and of the discourse of their First Teacher, Aristotle) which when learned people ponder they derive from it no knowledge

<sup>304 &</sup>lt;sup>1</sup> 'Ilm al-falak, or its plural al-'ulūm al-falakiyya, was often used interchangeably with 'ilm al-hay'a in Arabic writings. When astrology was to be distinguished from astronomy, the Arabic equivalent of the former was sinā'at ahkām al-nujūm. See Pines, 'The Semantic Distinction between the Terms Astronomy and Astrology', 345.

except that the philosophers are amongst the most ignorant creatures concerning the Lord of beings and that the Jewish and Christian heretics are more knowledgeable than they are about these matters? 307. The ninth consideration. The prophets and saints possess revealed and inspired knowledge that is not within the compass of the syllogism which the philosophers prescribe. Nor is it within the compass of physiognomy and the like. Since the philosophers include their syllogism in the sensory and intelligible propositions they have stipulated, they cannot deny what they have not stipulated; they are thus left with no standard [against which they can judge matters outside their system]. Ibn Sīnā and his followers have enumerated the propositions which must be admitted and which constitute the subject-matter of demonstration: [i.e.] the a priori, the sensory, the experiential, the intuitive, and the multiply transmitted. To these they sometimes add propositions which coexist with their own

307 1 This is the tenth consideration in al-Radd. In the ninth consideration, omitted altogether by Suyūtī, Ibn Taymiyya argues at length (al-Radd, 396-437) against the logicians who maintained that widespread (mashhūrāt), and to a lesser extent estimative (wahmiyyāt), propositions do not lead to certain knowledge. See Ibn Sīnā, Najāt, 98-9; Rāzī, Tahrīr, 168. The more important aspects of Ibn Taymiyya's critique are as follows. His first argument addresses the distinction made by the logicians between a priori statements and widespread premisses; in the latter the subject is affirmed of the predicate through a middle term, while in the former such affirmation, whether mental or extramental, needs no middle. Ibn Taymiyya rejects this classification, since, in his view, the apprehension of the predication of one attribute upon another is not an objective fact intrinsic to the thing itself, but is rather a relative matter that changes from one person to another. In one and the same thing about which we affirm a given attribute of another, one person might consider such an affirmation as a priori, needing no middle term, while another might deem such a middle necessary. In Ibn Taymiyya's view there is simply nothing objectively inherent in a proposition which makes it a priori: whether a proposition is so considered or not is a relative matter dependent upon the individual and the quality of his apprehension. (Here he levels a lengthy critique against Fakhr al-Din al-Rāzī for espousing the aforementioned distinction between a priori and widespread propositions (pp. 402-19).) Secondly, Ibn Taymiyya asserts that statements of the widespread kind, such as 'Justice is good' and 'Tyranny is deplorable', are known with certitude to all communities and groups, including the philosophers themselves. The knowledge of such propositions is more ingrained in the minds of people and quantitatively far more abundant than that of medical propositions known through experiment. And since the latter are deemed by the philosophers to lead to certitude, it is only logical, Ibn Taymiyya maintains, that widespread propositions should also be considered certain. (On the apodictic nature of experiential propositions, see Razī, Tahrīr, 166; Ghazāli, Maqāsid, 103). Finally, Ibn Taymiyya argues that widespread propositions are necessary (darūriyya) in the soul and that it is the function of the faculty of natural intelligence (fitra) to apprehend them. It is because such knowledge is so instinctive that all nations share in these propositions.

definitions (qadāyā qiyāsātuhā ma'ahā).<sup>2</sup> However, they adduce no evidence in favour of confining propositions to these, and it is for this reason that their supporters admit this taxonomy to be dispersed, not exhaustive—and incapable of being proven. Since this is the case, it does not follow that anything which is not covered by their syllogism cannot be apprehended. Therefore, logic is not a canonical instrument which, when correctly used, protects one from falling into error. For when propositions apprehended through different methods present themselves, they cannot be evaluated by means of these proofs.

308. The generality of these logicians deem false that which is reached through inferences other than their syllogism. This is the highest form of ignorance, particularly when that which they have rejected belongs to the traditions of the prophets. If the noblest of all sciences cannot be known through their method, then two matters arise; the first being that they cannot disprove what they have rejected if it falls outside the scope of their syllogism; and the second being that what they know is but little compared with what they do not know. Then how much more meagre is their knowledge when it is known that it does not lead to salvation and happiness?

309. The tenth consideration. They deem sound knowledge, which must be admitted, to be invalid, and consider that which is false or which has the semblance of knowledge to be true knowledge. Accordingly, they claim that the prophets' message concerning the knowledge of God's existence and attributes and of resurrection has no reality in actual existence, and that the prophets communicated to the masses what they fancied about these matters in order that the masses might benefit in conducting the affairs of their earthly life, but not in order that they might apprehend the truth. This, they claim, is a sort of lying in the interest of the people. They also argue that the Prophet is well versed in practical, but not theoretical,

<sup>&</sup>lt;sup>2</sup> Propositions which coexist with their definitions (qadāyā hudūduhā ma'ahā) can only be another name for propositions which coexist with their own syllogisms (qadāyā qiyāsātuhā ma'ahā). See sources cited in par. 302, n. 1, above, where qadāyā qiyāsātuhā ma'ahā is always considered one of the demonstrative propositions. A proposition of this type is one apprehended by means of a middle, although such a middle is presupposed in the mind. Thus, whenever a minor premiss is brought before the mind, the conclusion will simultaneously occur with it since the middle term is constantly present (lā ya'zub 'an al-dhihn). See Ghazālī, Mi'yār, 192; Rāzı, Taḥrīr, 166; Jurjānī, Ta'rīfāt, 155, s.v. al-qadāyā al-latī qiyāsātuhā ma'ahā.

<sup>309 &</sup>lt;sup>1</sup> Cf. Ghazālī, *Tahāfut*, 282 ff. (English trans., 229 ff.).
<sup>2</sup> See par. 87, nn. 1-2, above.

religion.<sup>3</sup> Some of them hold the philosopher to be superior to all prophets, including our Prophet,<sup>4</sup> may he be praised most highly. They do not think it necessary to follow a particular prophet, whether it be Muḥammad or someone else. This is why, when the Tatars appeared and some of them wanted to convert to Islam, a philosopher who was in the company of Hulagu is reported to have advised him not to allow conversion. He said that the language of Islam is Arabic, and you are not in need of Islam's Law.

310. Furthermore, those of them who follow the Prophet in religious practices do not follow him with regard to the principles of religion or matters of faith. To them, the Prophet is as one of the four eponyms of the legal schools is to the speculative theologians; for when the speculative theologians follow one of the four legal schools, they follow it only in positive law, but do not abide by its legal theory nor by its doctrine concerning the unity of God. On these last matters they may deem their own leading theologians to be superior.<sup>1</sup>

311. The Prophet spoke of God's specific names and attributes, as well as of the angels, the Throne, the Seat, Paradise, and Hell; none of these can be known through their syllogism. He spoke, too, of particular issues that had existed or that will come into existence; also none of these can be known through their syllogism, whether it be demonstrative or not. Their syllogisms lead only to universal matters, and these are particular issues. The Prophet, may he be praised, predicted the particular events that will take place. He spoke of the Tatars who appeared six hundred years after his prediction, as well as of the fire  $(n\bar{a}r)$  which broke out in the year 655, before the coming of the Tatars. How could one imagine that their

<sup>&</sup>lt;sup>3</sup> See par. 87, nn. 1-2, above.

<sup>&</sup>lt;sup>4</sup> This seems to be the implication in Ikhwān al-Ṣafā', Rasā'il (Risāla fī al-Ārā' wal-Diyānāt, no. 42), iv. 21-2.

<sup>310 &</sup>lt;sup>1</sup> The abridgement of the preceding paragraph represents an extremely rare instance in which Suyūti paraphrases, and even alters, the text of al-Radd. Suyūti here speaks of the four eponyms representing the surviving legal schools, whereas in al-Radd, 443, Ibn Taymiyya does not limit them to four, but speaks of madhāhib (schools) in a general sense, including the madhāhib of lesser mujtahidūn. Thus, in addition to Abū Hanīfa (d. 150/767), Mālik (d. 179/795), Shāfi'ī (d. 204/820), and Ibn Hanbal (d. 241/855), he mentions Ishāq Ibn Rāhawayhi (d. 238/852), al-Layth b. Sa'd (d. 157/773), al-Awzā'ī (d. 158/774), and Dāwūd b. 'Alī al-Zāhirī (d. 270/884).

<sup>311 &</sup>lt;sup>1</sup> From the description of Subki, what was taken as a fire seems to have been a volcano which erupted near Medina for a period of over a month. This event was seen as a fulfilment of the Prophetic statement: 'The Day of Judgement shall not occur until fire breaks out in the land of the Hijāz.' See Subkī, *Tabaqāt*, v. 112; Ibn al-Wardi, *Tatimma*, ii. 281.

syllogism and demonstration can inform us about a particular human or a particular nation, let alone about someone having the attributes which the Prophet reported?

- 312. Among their evils and heresies is their view that the Creator, the Exalted, does not know particulars. Nor does He know Moses and Jesus as individuals, nor others, nor any event in detail. Our refutation of them with regard to this matter has been expounded elsewhere, however. The intention here is to let people know that their ignorant and heretical views are extremely erroneous because they try to avoid that which is inevitable and for the rejection of which they have no evidence whatsoever.
- 313. The eleventh consideration. They do acknowledge external as well as inner sensations, such as hunger, pain, and pleasure. But they deny the existence of what only some people observe, such as the angels and the demons, and what the soul sees upon death. The Book and the Sunna speak in affirmation of such visions. However, a detailed discussion of these issues belongs elsewhere. The point we would like to make is that the false logical principles which they adopted concerning the rejection of that which cannot be rejected inevitably brought upon them ignorance and heresy which blinded them, thus making them worse than the Jewish and Christian heretics.
- 314. The twelfth consideration. According to them, for a proposition to be demonstrative means that it is known with certainty to those who use it in inferences; to be dialectical means that it is universally admitted (musallama); to be rhetorical means that it is widespread (mashhūra), accepted (maqbūla), or probable (maznūna). All these distinctions, in accordance with their own principles, are contingently relational and relative to the proposition, and do not constitute qualities that are inseparable, or, much less, essential to it. In fact, these distinctions contain no quality which is inherent in the proposition itself; rather, they are relative qualities to

<sup>312 1</sup> See par. 45, n. 3, above.

<sup>&</sup>lt;sup>2</sup> See al-Radd, 476-7; Marmura, 'Avicenna's Theory of God's Knowledge', 299 ff., 303-4 (n. 34).

<sup>313 &</sup>lt;sup>1</sup> Cf. Shahrastānī, *Milal*, 30, 55. In *al-Radd*, 471, Ibn Taymiyya remarks that the majority of the early great philosophers, such as Hippocrates, did not subscribe to such views.

<sup>314 &</sup>lt;sup>1</sup> Ibn Sīnā, *Ishārāt*, i. 510 ff. (English trans., 148-9); Ghazālī, *Maqāṣid*, 106 ff.; Rāzī, *Taḥrīr*, 168; Khabīṣī, *Sharh*, 95 ff.

be considered from the viewpoint of those who are cognizant of them. The proposition may be known to be true, and yet one may not be cognizant of it, let alone perceive it as probable or certain. The proposition may be rhetorical or dialectical, and it may be true in itself. It may also be demonstrative, as they themselves admit. And since this is the case, the messengers, may they be praised, have communicated propositions which are in themselves true, and which are not, in any way, false or invalid. They have also elucidated apodictic methods by means of which the truthfulness of common (mushtarak) propositions can be established, and from which the human species derives benefit—this is the knowledge that is beneficial for people.

315. These philosophers, however, did not follow this path. Instead they followed the path of relativity, and thus held demonstrative propositions to be that which the reasoner knows with certitude. Other propositions they have held to be non-demonstrative, though another reasoner may know them [with certainty]. Accordingly, what is demonstrative for one person or group may not be so for others. Thus, apodictic propositions cannot be given an exhaustive and exclusive definition (hadd jāmi' māni'),1 because they differ according to the state of mind of the person who knows or does not know them. The artisans in every field know propositions that no one else knows. Thus, considering how the artisans in each field view matters to be truthful or false, right or wrong, it would be impossible by the logicians' method to distinguish between truth and falsehood, right and wrong. Contrary to the method of the prophets, theirs cannot be commonly beneficial to humans. The prophets have communicated truthful propositions which distinguish between truth and falsehood, right and wrong. Whatever contradicts the truth is false, and whatever contradicts right is wrong. This is why God made the Book which He revealed a judge amongst people in their disputes. He also revealed the Balance as well as that which is weighed by it so that truth may be distinguished from falsehood.<sup>2</sup> Every truth has a balance by which it is weighed. This is contrary to what the philosopher-logicians have held, which can neither lead to the truth nor distinguish between truthfulness and falsehood; nor does it constitute a balance by means of which one knows truth from falsehood.

<sup>315</sup> On exhaustive and exclusive definition see par. 15, n. 1, above. See pars. 297, 300, 301 above.

316. As for the speculative theologians, whatever part of their discourse agrees with what the prophets have brought down is valid. But whatever disagrees with it belongs to heresy, whether judged by revelation or reason.

317. It may be argued: 'We hold demonstrative propositions to be relative, for everything a person apprehends on the basis of his own premisses is for him demonstrative, although for others it may not be so.' We should respond: you do not hold this view, since those who do would not find the subject-matter of demonstration in particular things, though it is possible for many people to apprehend matters other than those particular ones which you have specified. If they argue: 'We do not specify the subject-matters', then a part of logic is invalidated, and that is what we sought to prove.

318. The thirteenth consideration. They think that their method is universal and comprehends all the methods of knowledge cultivated by man. But this is not so. Through sense perception, reason, or truthful traditions, people have acquired a good deal of knowledge which cannot be known through the methods they have mentioned. Included in this knowledge is what the prophets, may God praise them, taught. But the philosophers wished to make the teachings of the prophets conform to their invalid canons. Accordingly, they held that a prophet possesses powers greater than those of others, so much so that he grasps the middle term without being taught (ta'līm). When he forms a concept, he apprehends through these powers the definition which others may find difficult or impossible to formulate without being taught, because the perceptive powers of the Prophetic souls are unlimited. They have held that what the prophets tell about the invisible is known through a logical syllogism, a claim which is utterly false.1 As we have previously mentioned, through logical syllogism only universal matters can be apprehended, and this they admit. But the messengers have told about individual, singular, and particular matters, matters of the past, present, and future. Therefore, what the messengers have taught does not obtain through the logical syllogism. Ibn Sīnā even held the Lord's knowledge of His creatures to be of this kind; but God, the Exalted, is far above what he claimed.2

319. From the foregoing it has become clear that restricting the

<sup>318 &</sup>lt;sup>1</sup> Ibn Sinā, *Najāt*, 205-6, 339; Ghazālī, *Maqāṣid*, 380-3.
<sup>2</sup> Marmura, 'Avicenna's Theory of God's Knowledge', 302-3.

methods for the acquisition of knowledge to those which they have stipulated in logic is false, both in content and form. It has also become clear that they have excluded from the valid sciences those which are more sublime, more imposing, and more numerous than those they have subscribed to, and that the methods they have prescribed lead to only a few contemptible sciences that are neither noble nor numerous. Such is the level of these people—in their knowledge and practice they are the lowest of all humans. In many ways, the heretical Jews and Christians are more noble in their knowledge and practice. The entirety of philosophy does not even elevate its follower to a degree equal to that of the Jews and Christians after the latter have abrogated and distorted [their own Books], let alone prior to their doing so. In condemning Ibn Sinā's al-Shifa' Ibn al-Qushayrī recited the following:

We severed the ties of brotherhood with those stricken by the malady of the book of al-Shifa'.

How often have I said to them

You are about to be swept away by the book of al-Shifa'.

When they made little of our warning

We turned to God and He was sufficient

They then died while following the religion of Aristotle

And we lived according to the Religion of the Chosen.2

320. Someone may argue: 'Some of the logicians' views with regard to confining the methods of acquiring knowledge [to what they have prescribed] are found in the discourse of Muslim theologians. Some of the latter even espouse it verbatim or with changes in terminology.' We answer: not all the doctrines of the speculative theologians are true. However, all that which the messengers have brought down is true. Whatever in the views of the speculative theologians and others corresponds to what the messengers have brought down is true; whatever does not conform is false. The forefathers' and the leading scholars' condemnation of the heretically innovative speculative theologians is well known.

321. Ibn Taymiyya said: it is astonishing that these people claim to

<sup>319 &</sup>lt;sup>1</sup> Ibn Ḥajar al-'Asqalānī attributes this poem to Zayn al-Dīn al-Subkı. See *al-Durar*, ii. 396-7.

<sup>&</sup>lt;sup>2</sup> i.e. Muhammad the Prophet.

<sup>320 &</sup>lt;sup>1</sup> This seemingly anonymous statement finds full support in the writings of a great many theologians. See e.g. Rāzī, *Ma'ālim Usūl al-Dīn*, 3 ff. and *passim*.

want to protect the true Religion with their defective minds and false syllogisms. What they have done instead is that which only the heretics, the enemies of religion, have dared to do. They have neither protected Islam nor defeated the enemy. What is also astonishing is that they avoid following and imitating the infallible prophets who speak nothing but the truth. Instead, they imitate, and associate with, those who diverge from what the prophets have brought down—those whom they know to be fallible, who are at times wrong and at others right. It is only God who ensures the truth.

322. Al-Suyūtī said: this is the end of what I have abridged from Ibn Taymiyya's treatise. I have conveyed his words verbatim, mostly without any change. I have omitted much of his treatise, which consists of twenty fascicles. However, I have deleted nothing of value; what I did delete was not pertinent to the main argument. The deletions are either digressions or replies to metaphysical and other queries, or repetitions, or refutations of some logicians' views that do not have bearing upon any universal principle in logic, etc. Those who read this abridgement of mine will benefit more from it than they would should they take up the original work, for the latter is complex and difficult to use.

323. Thanks be to God. May He praise and give peace to Muhammad, the last of the prophets, and to his family and Companions.

### EMENDATIONS TO THE ARABIC TEXT

The following corrections do not include alterations to the punctuation of the text, although more often than not I departed from the editors' division of phrases and sentences. The left-hand column gives the page and line number in the Rabat edition of  $Jahd\ al\ Qariha$ . In the right-hand column the words to be corrected are followed by the sign '>' introducing the emendation. The basis of the emendation in the Leiden manuscript (L) and/or the Bombay edition of the unabridged work (B) is then cited.

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yusawwir > yatasawwar (L 137a: 11; B 11: 2)
 87: I
 87: 2
          mukhātab > takhātub (B 549: 29)
          aw fī al-man' > aw al-'aks (L 137a: 16)
 87: 9
 88: I
          -> fast (L 137a: 23)
          wa'in idda'at > wa'in idda'ū (B 31: 16)
 90: 9
          min ghayr taqlīd lil-khabar > min ghayr taqlīd lil-mukhbir (B
 93: 4
          39: 1)
          al-musammā > al-musammi (L 138b: 10)
 94: 8
          kalāmihi aw taswīr > kalāmihi wal-thānī bayān tasdīq kalāmihi.
 94: 12
          wa-taswīr . . . (B 40: 13)
          li-taswîr > ka-taswîr (B 40: 14)
 94: 13
 96: 16
          bil-ma'nā > lil-ma'nā (B 61: 17)
 97: 8
          al-'āmm > al-tāmm (L 139a: 18; B 62: 18)
          bayna al-wujūd wal-thubūt wa-kadhālika al-tafrīq bayna al-wujūd
 98: 5-6
          wal-māhiyya > bayna al-wujūd wal-māhiyya (L 139a: 29)
          wal-māhiyya > wal-mudda (B 66: 15)
 98: 11
          h-k-m > tahakkum (L 139b: 16; B 71: 15)
 99: 13
          yakhtur...lā yakhtur > takhtur...lā takhtur (L 139b: 21; B 71:
100: 3
          al-fusūl al-mumayyiza > al-fusūl al-dhātiyya al-mumayyiza (L
101: 9
          140a: 8)
          wa-yumkin al-ākhar > wa-yumkin shakhsan an yaj alahu dhātiyyan
101:11
          wa-yumkin al-ākhar (L 140a: 10)
          - > al-maqām al-thālith (B 88: 1)
102: 9
106: 8
          al-mutawātirāt > al-mu'aththirāt (B 107: 19)
106: 13
          al-nafsiyy\bar{a}t > al-yaq\bar{i}niyy\bar{a}t (B 108: 2)
          qārabahā > fāraqahā (B 108: 4)
106: 15
          al-'ayn > al-mu'ayyan (L 1412: 22)
107: 9
          khamr > muskir (L 141b: 29)
110: 7
          burhānihim min qadiyya > burhānihim an yuqāl: idhā kāna lā
114: 8-9
          budda min qadiyya (B 115: 2-3)
116: 11
          al-tafriq > al-taqrir (L 143a: 18; B 117: 4)
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176	Emendations to the Arabic Text
118: 5	li-madlūlātihā ghayra anna al-mantiqiyyīn wa-jumhūr > li- madlūlātihā min ghayri i tibār dhālik bi-mīzān al-mantiqiyyīn lākin jumhūr(L 143b: 10)
121: 12	al-ladhī yahsul > al-ladhī lā yahsul (L 144a: 22; B 121: 14)
	kull alif $jim > al$ -alif $jim$ (L 144a: 31; B 560: 18)
122: 5	min al-kulliyya > min al-qadāyā al-kulliyya (B 123: 1)
123: 3 123: 4	al-'ulūm thalātha > al-'ulūm 'indahum thalātha (B 123: 3)
-	minhumā > fīhimā (B 123: 8)
123: 7	$q\bar{u}^* > wuqu^* (L 145a: 2)$
125: 5	
130: 8	al-handasa wa-sammūhu > al-handasa fa-ja'alūhu ashkālan kal- ashkāl al-handasiyya wa-sammūhu (L 146a: 4-5; B 137: 18)
130: 8	li-hudūd > ka-hudūd (B 137: 19)
131: 13	wa-nafs aqsāmih > wa-nafs inqisāmih (L 146a: 21; B 139: 3)
131: 17	fa-laysa mā > fa-laysa fīhā mā (L 146a: 24; B 139: 7)
140: 7	al-falāsifa al-mutaqaddimīn > al-falāsifa wal-mutakallimūn lākin al-mutakallimūn yaqūlūn bil-hudūth li-kawn al-fā'il 'indahum fā'ilan bil-ikhtiyār wa-hādhā ghalat 'alā al-tā'ifatayn bal lam yaqul
	dhālika ahad min al-matakallimīn wa-lā al-falāsifa al-mutaqaddimīn (L 148a: 8–10; B 149: 3–6)
141: 8-9	ma'lūmihi, lam yastafīdū > ma'lūmihi, wa-hum lam ya'lamū 'ilman yabqā bi-baqā' ma'lūmih lam yastafīdū (B 150: 7-8)
144: 4	al-mawjūd al-wājib > al-wujūd al-wājib (B 153: 7-8)
144: 10	al-'ayn $> al$ -mu'ayyan (B 154: 7)
144: 14	dalīl 'alā malzūm > dalīl 'alā lāzimih (L 149a: 3)
148: 15	rusulunā > rusuluhum (L 149b: 24; also Quran, 40: 83)
154: 6	$wa-kadhk > wa-kadh\bar{a} (L 150b: 27)$
158: 5	min hasr > min ghayr hasr (B 166: 16)
164: 8	kull hayawān jism wa-kull jism jawhar fa-kull insān hayawān fa- yalzam > kull insān jism wa-kull jism jawhar, fa-yalzam (see par.
-6	145, n. 3, above)
165: 15	wajaba, fa-idhā > wajaba, fa-hādhā qad wajaba, fa-idhā(L
- (- 0	153a: 10–11; B 173: 3–4)
167: 8	wa-ma'ānin mutta'ada > wa-ma'ānin muta'addida (B 174: 7)
172: 15	huwa al-ma'qūlāt min haythu > huwa al-ma'qūlāt al-thāniya min haythu (L 154b: 8; B 179: 20)
172: 16	al-nisab al-thāniya > al-nisab al-thābita (B 179: 21)
181: 8	muqaddimatayn lā fil-intāj li'anna al-sharṭ mughāyir lil-mashrūt wa-laysa > muqaddimatayn faqat wa-laysa (B 191: 23-192: 1)
185: 2	kitāban fī tahāfutihim > kitāban fī maqāsidihim wa kitāban fī tahāfutihim (L 157a: 10)
188: 8	w- $j$ - $d$ > $w$ a- $k$ hudh ( $L$ 157 $b$ : 21)
189: 15	lā yakūn illā a'amm > lā yakūn a'amm (B 202: 10)
189: 18	sighat > sifat (B 202: 14)
	the real flowers of change of the second flowers of the second

188: 8 189: 15 189: 18

wa'innamā > wa'inna mā (L 159a: 3; B 206: 17-18) 194: I 198: 10 li-ghayrihā abadan > li-ghari mā abdā (L 159b: 21) muta'adhdhir > muhdar (L 160a: 24; B 212: 7)201: 3 206: 9 bil-hadd wa-man' husūl al-tasdīq bil-hadd wa-man' > bil-hadd waman' (L 161a: 31) al-tasdīq bil-qiyās > al-tasdīq illā bil-qiyās (L 161a: 31) 206: 10 211: 3 wa-hādhā > wa-hādhihi (B 251: 14) ta'ab. > ta'ab. fa-hwa lahmu jamalin ghathth 'alā ra'si jabalin 217: 12 wa'r, lā sahl fa-yurtaqā wa-lā samīn fa-yuntaqal (L 163b: 17-18; B 297: 14-15) radda 'alā > rū'iya (L 163a: 21; B 297: 19) 217: 17 al-ashī' > illā shay'an (B 300: 20-1; cf. also L 164a: 13) 219: 13 Aqsām al-Dhāt > Aqsām al-Ladhdhāt (B 321: 10) 225: 13 yumaththilūn bi-hādhihi > bi-mithl hādhihi (B 323: 2) 226: 9 allaftu kitāban > allaftu fīhi kitāban (B 324: 12) 227: 11 al-mutaqaddimatān > al-muqaddimatān (L 166b: 5; B 338: 21) 232: 9  $f\bar{i}h\bar{a} > f\bar{i}him\bar{a} (L 166b: 31; B 339: 5)$ 232: 15 yusta'mal jamī' > yusta'mal fīhi jamī' (L 167a: 2; B 339: 10) 232: 18 fa'idhā qāla > fa'idhā qulnā (L 167a: 17; B 344: 16) 234: I bil-irāda, fa-naqūl > bil-irāda, fa-naqdī qadā'an 'āmman anna 236: 16 kull insān hassās mutaharrik bil-irāda, fa-naqūl . . . (L 167b: 24) qiyās, wal-qiyās > qiyās aw bi-ghayr tawassut qiyās, wal-qiyās (B 236: 17 363: 12) al-'āmm > al-'āmma (L 167b: 7; B 363: 16) 237: I al-haml > akmal (L 169a: 17) 243: 13 h(ijriyya) > - (L 170a: 16)248: 15 jāmi', bal > jāmi' māni', bal (L 170b: 6; B 472: 15) 250: 13

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THE numbers appearing under R, L, and B indicate the beginnings of paragraphs in the translation. Line numbers, separated by a colon, appear after page or folio numbers.

R: the 1961 Rabat edition of Jahd al-Qarīḥa;

L: the Leiden manuscript of Jahd al-Qarīha;

B: the 1949 Bombay edition of al-Radd 'alā al-Mantiqiyyīn.

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<sup>&</sup>lt;sup>3</sup> In conjunction with Nashshār's edition, 343: 14-18.

# REFERENCES

#### I. Primary Sources

- Aḥmadnagarī, 'Abd al-Nabī Ibn 'Abd al-Rasūl, Jāmi' al-'Ulūm al-Mulaqqab bi-Dustūr al-'Ulama, 4 vols. (Haydarabad: Maṭba'at Dā'irat al-Ma'ārif, 1329-31/1911-12).
- Älūsī, Nu'mān Khayr al-Dīn, Jalā' al-'Aynayn fī Muhākamat al-Ahmadayn (Cairo: Matba'at al-Madanī, 1381/1961).
- Āmidī, Abū Ḥasan 'Alı b. Muḥammad Sayf al-Dīn, Abkār al-Afkār, MS. Petermann, I, 233, Staatsbibliothek Preussischer Kulturbesitz, Berlin.
- al-Iḥkām fī Usūl al-Aḥkām, 3 vols. (Cairo: Matba'at Muḥammad 'Alī Subayh, 1387/1968).
- al-Mubīn fī Sharh Alfāz al-Hukama wal-Mutakallimīn, in al-Faylasūf al-Āmidī, ed. 'Abd al-Amīr al-A'sam (Beirut: Dar al-Manhal, 1987).
- Amīn, al-Sayyid Muhammad, A'yān al-Shī'a, ed. Hasan al-Amīn, 10 vols. (Beirut: Dar al-Ta'āruf, 1986).
- Aristotle, *The Works of Aristotle*, trans. into English under the editorship of W. D. Ross, 12 vols. (London: Oxford University Press, 1924):
  - Volume I: Categoriae and De Interpretatione (by E. M. Edghill), Analytica Priora (by A. J. Jenkinson), Analytica Posteriora (by G. R. G. Mure), Topica and De Sophisticis Elenchis (by W. A. Pickard-Cambridge);
  - Volume VIII: Metaphysica (by W. D. Ross).
- 'Asqalānī, Ahmad b. 'Alı Ibn Hajar, al-Durar al-Kāmina fī A'yān al-Mā'a al-Thāmina, 4 vols. (Haydarabad: Dā'irat al-Ma'ārif, 1350/1931).
- Lisān al-Mīzān, 7 vols. (Beirut: Mu'assasat al-A'lamī lil-Matbū'āt, 1390/1971).
- Badawī, 'Abd al-Rahmān (ed.), *Plotinus apud Arabes* (Cairo: Maktabat al-Nahda al-Misriyya, 1955).
- Baghdādī, Abū al-Barakāt Hibat Allāh Ibn 'Alī Ibn Malkā, al-Mu'tabar fī al-Ḥikma, 3 vols. (Haydarabad: Dā'irat al-Ma'ārif al-'Uthmāniyya, 1357/1938).
- Baghdādī, Abū Manṣūr 'Abd al-Qāhir Ibn Tāhir al-Tamımı, *Usūl al-Dīn* (Istanbul: Matba'at al-Dawla, 1346/1928).
- Bājī, Abū al-Walıd Sulaymān Ibn Khalaf, Kitāb al-Hudūd fī al-Usūl, ed. Nazīh Hammād (Beirut: Mu'assasat al-Zu'bī, 1973).
- Basrī, Abū al-Husayn Muḥammad b. 'Alī, Kitāb al-Mu'tamad fī Usūl al-Fiqh, ed. M. Hamidullah et al., 2 vols. (Damascus: Institut Français de Damas, 1964-5).
- Battāni, Abū 'Abd Allāh Muhammad b. Sinān b. Jābir, al-Zīj al-Sābi', ed. Carlo A. Nallino, Opus Astronomicum (Milan, 1899).

- Baydāwī, 'Abd Allah Ibn 'Umar, Anwār al-Tanzīl wa-Asrār al-Ta'wīl (Cairo: Muhammad 'Alı Subayh, 1371/1951).
- Bukhārı, Abū 'Abd Allāh Muḥammad, Kitāb al-Jāmi' al-Ṣaḥīh, ed. M. L. Krehl and Th. W. Juynboll, 4 vols. (Leiden: E. J. Brill, 1908).
- Bukhārī, Ṣafī al-Dīn al-Ḥanafī, al-Qawl al-Jalī fī Tarjamat al-Shaykh Taqī al-Dīn Ibn Taymiyya, in al-Majmū' al-Mushtamil 'alā al-Durar al-Ātiya, ed. Faraj Allāh al-Kurdı (Cairo: Matba'at Kurdistān al-'Ilmiyya, 1329/1911).
- Daylamı, Shīrawayh b. Shahridār, Kitāb Firdaws al-Akhbār, 5 vols. (Beirut: Dar al-Kitāb al-'Arabı, 1407/1987).
- Descartes, Rene, Discourse on Method and Meditations, trans. L. J. Lafleur (New York and London: Macmillan Publishing Company, 1960).
- Dhahabī, Muḥammad Abū 'Abd Allāh Shams al-Dīn, *Tadhkirat al-Ḥuffāz*, 4 vols., 3rd edn. (Haydarabad: Maṭba'at Majlis Dā'irat al-Ma'ārif al-'Uthmāniyya, 1377/1958).
- Fārābi, Abū Naṣr Muḥammad Ibn Tarkhān, İsāghūjī, in al-Mantiq 'inda al-Fārābī, ed. Rafiq al-'Ajam (Beirut: Dār al-Mashriq, 1985).
- The Political Regime, trans. F. Najjar, in R. Lerner and Muhsin Mahdi (eds.), Medieval Political Philosophy (Ithaca: Cornell University Press, 1963), 31-57.
- Kitāb al-Qiyās al-Saghır, ed. Mubahat Türker, in Revue de la Faculte des langues, d'histoire, et de geographie de l'Universite d'Ankara, 16 (1958), 244-86. Trans. Nicholas Rescher, Al-Fārābī's Short Commentary on Aristotle's Prior Analytics (Pittsburgh: University of Pittsburgh Press, 1963).
- Kitāb Taḥṣīl al-Sa'āda (Haydarabad: Matba'at Majlis Dā'irat al-Ma'ārif al-'Uthmāniyya, 1345/1926). Trans. Muhsin Mahdi, Al-Fārābī's Philosophy of Plato and Aristotle (Ithaca: Cornell University Press, 1962).
- al-Tawti'a fī al-Mantiq, in al-Mantiq 'inda al-Fārābī, ed. Rafīq al-'Ajam (Beirut: Dār al-Mashriq, 1985).
- Fārid, Abū al-Najā, Kitāb al-Khamsīn Mas'ala fī Kasr al-Mantiq, in M. Mohaghegh and T. Izutsu (eds.), Collected Texts and Papers on Logic and Language (Tehran: Tehran University Press, 1974).
- Farrā', Abū al-Husayn Muhammad Ibn Abī Ya'lā, *Tabaqāt al-Hanābila*, ed. Muhammad Hamid al-Faqī, 2 vols. (Cairo: Matba'at al-Sunna al-Muhammadiyya, 1952).
- Ghazālī, Abū Hāmid, Fadā'ih al-Bātiniyya, ed. 'Abd al-Rahmān Badawī (Cairo: Dār al-Qawmiyya lil-Tibā'a wal-Nashr, 1383/1964).
- Maqāsid al-Falāsifa, ed. Sulaymān Dunyā (Cairo: Dār al-Ma'ārif, 1961).
- Mihakk al-Nazar fī al-Mantiq, ed. Muhammad al-Na'sānī and Mustafa al-Dimashqī (Cairo: al-Matba'a al-Adabiyya, n.d.).
- Mi'yār al-'Ilm fī Fann al-Manṭiq, ed. Sulaymān Dunyā (Cairo: Dār al-Ma'ārif, 1961).
- al-Munqidh min al-Dalāl, ed. Jamīl Şalıbā and Kāmil 'Iyād (Damascus: Matba'at Jāmi'at Dimashq, 1960).

- al-Mustasfā min 'Ilm al-Usūl, 2 vols. (Būlāq: al-Maṭba'a al-Amīriyya, 1322/1904).
- al-Qisṭās al-Mustaqīm (Cairo: Dar al-Thaqāfa al-'Arabiyya, 1381/1962). Tahāfut al-Falāsifa, ed. Sulaymān Dunyā (Cairo: Dar Ihyā' al-Kutub al-'Arabiyya, 1947). Trans. Sabih A. Kamali, al-Ghazālī's Tahāfut al-Falāsifa (Incoherence of the Philosophers) (Lahore: B. A. Dar, 1963).
- Harawī, Aḥmad b. Yaḥyā al-Ḥafid, al-Durr al-Nadīd (Cairo: Matba'at al-Taqaddum, 1322/1904).
- Ibn Abī al-Salt, Umayya b. 'Abd al-'Azīz al-Dānı, *Kitāb Taqwīm al-Dhihn*, ed. and trans. (Spanish) C. Gonzalez Palencia (Madrid: Matba'at Ibīriqa, 1915).
- Ibn 'Aqīl, 'Alī Abu al-Wafā', Kitāb al-Jadal 'alā Tarīqat al-Fuqahā', ed. George Makdisi, 'Le Livre de la dialectique d'Ibn 'Aqil', in Bulletin d'etudes orientales, 20 (1967), 126-204.
- Ibn 'Arabī, Muhyī al-Dīn, Fusūs al-Hikam, ed. Abu al-'Alā 'Afīfī, 2 vols. (Beirut: Dar al-Kitāb al-'Arabī, 1946).
- --- Kitāb Inshā' al-Dawā'ir, ed. H. S. Nyberg, Kleinere Schriften des Ibn al-'Arabī (Leiden: E. J. Brill, 1919).
- Ibn al-Bazzāz, Muḥammad b. Muḥammad b. Shihāb, al-Jāmi' al-Wajīz (or al-Fatāwā al-Bazzāziyya), printed on the margins of vols. iv-vi of Mawlānā Shaykh Nizām et al., al-Fatāwā al-Hindiyya, 6 vols. (Beirut: Dar Iḥyā' al-Turāth al-Arabī, 1400/1980).
- Ibn Fāris, Abū al-Ḥusayn Aḥmad, al-Ṣāḥibī fī Fiqh al-Lugha, ed. Mustafa al-Shuwaymī (Beirut: Mu'assasat Badrān lil-Tibā'a wal-Nashr, 1964).
- Ibn al-Ḥājib, Jamal al-Dīn 'Uthmān, Muntahā al-Wuṣūl wal-Amal fī 'Ilmayy al-Uṣūl wal-Jadal, ed. Muḥammad Badr al-Dīn al-Na'sānī (Cairo: Maṭba'at al-Sa'āda, 1908).
- Ibn Hanbal, Ahmad, al-Radd 'alā al-Jahmiyya wal-Zanādiqa, ed. 'Abd al-Rahmān 'Umayra (Riyād: Dar al-Liwā', 1397/1977).
- Ibn Hazm, 'Alī b. Aḥmad, al-Taqrīb li-Ḥadd al-Manṭiq, in Iḥsān 'Abbās (ed.), Rasā'il Ibn Ḥazm al-Andalusī, 4 (Beirut: al-Mu'assasa al-'Arabiyya lil-Dirāsa wal-Nashr, 1983).
- Ibn al-Humām, Kamāl al-Dīn Muḥammad, al-Taḥrīr fī Uṣul al-Fiqh (Cairo: Mustafa Bābī al-Halabı, 1351/1932).
- Ibn al-'Imād, Abū al-Falāḥ 'Abd al-Hayy al-Hanbalī, Shadharāt al-Dhahab fī Akhbār man Dhahab, 8 vols. (Cairo: Maktabat al-Quds, 1350-1/1931-2).
- Ibn Kathīr, Abū al-Fidā' al-Ḥāfiz, *al-Bidāya wal-Nihāya*, ed. Aḥmad Abū Mulḥim *et al.*, 14 vols. (Beirut: Dār al-Kutub al-'Ilmiyya, 1985).
- Ibn Malkā. See Baghdadī, Abū al-Barakāt.
- Ibn Manzūr, Jamal al-Dīn Muḥammad, Lisān al-'Arab, 15 vols. (Beirut: Dār Sādir, 1972).
- Ibn al-Murtadā, Aḥmad b. Yaḥyā al-Yamānī, al-Milal wal-Niḥal, ed. Muhammad Jawād Mashkūr (Beirut: Dār al-Fikr, 1399/1979).

- Ibn al-Murtadā, Ahmad b. Yahyā al-Yamānī, Kitāb al-Munya wal-Amal fī Sharh al-Milal wal-Niḥal, ed. Muḥammad Jawād Mashkūr (Beirut: Dar al-Fikr, 1399/1979).
- Tabaqāt al-Mu'tazila, ed. Susanna Diwald-Wilzer, Die Klassen der Mu'taziliten (Wiesbaden: Franz Steiner Verlag, 1961).
- Ibn al-Nadīm, Fihrist (Beirut: Dar al-Ma'rifa lil-Tibā'a wal-Nashr, 1398/1978).
  Ibn Qayyim al-Jawziyya, Ighāthat al-Lahfān min Masāyid al-Shaytān, ed. Muḥammad S. Kīlānī, 2 vols. (Cairo: Maktabat Muṣṭafa Bābī al-Ḥalabī, 1381/1961).
- —— Ijtima al-Juyūsh al-Islāmiyya 'alā Ghazw al-Mu'attila wal-Jahmiyya, ed. Zakariyyā 'Alī Yūsuf (Cairo: Matba'at al-Imām, n.d.).
- Ibn Qudāma, Muwaffaq al-Dīn 'Abd Allah b. Aḥmad, Rawdat al-Nāzir wa-Junnat al-Munāzir, ed. Sayf al-Dīn al-Kātib (Beirut: Dar al-Kātib al-'Arabī, 1401/1981).
- Ibn Qutayba, Abū Muḥammad 'Abd Allāh b. Muslim, al-Ma'ārif, ed. Muḥammad al-Sāwī (Karachi: Nur Muḥammad, 1396/1976).
- Ibn Rajab, Abū al-Faraj 'Abd al-Raḥmān b. Shihāb al-Dīn, al-Dhayl 'alā Tabaqāt al-Ḥanābila, 2 vols. (Cairo: Maṭba'at al-Sunna al-Muḥammadiyya, 1952-3).
- Ibn Rushd (Averroes), Abū al-Walīd, Averroes' Three Short Commentaries on Aristotle's 'Topics', 'Rhetoric', and 'Poetics', ed. and trans. Charles E. Butterworth (Albany: State University of New York Press, 1977).
- Kitāb Fasl al-Maqāl, ed. George F. Hourani (Leiden: E. J. Brill, 1959). Trans. George F. Hourani, Averroes on the Harmony of Religion and Philosophy (London: Luzac & Co., 1961).
- Tafsīr mā ba'd al-Tabī'a, ed. Maurice Bouyges, 4 vols. (Beirut: Imprimerie catholique, 1938-52). English trans. of book Lām, Charles Genequand, Ibn Rushd's Metaphysics (Leiden: E. J. Brill, 1986).
- Tahāfut al-Tahāfut, ed. Maurice Bouyges, (Beirut: Imprimerie catholique, 1930). Trans. Simon van den Bergh, Averroes' Tahāfut al-Tahāfut (The Incoherence of the Incoherence), 2 vols. (London: Luzac & Co., 1969).
- Talkhīs Mantiq Aristū, ed. Gerard Jehamy, 3 vols. (Beirut: Publications de l'Universite libanaise, 1982). Volume I: al-Maqūlāt; al-'Ibāra; al-Qiyās. Trans. Charles Butterworth, Averroes' Middle Commentaries on Aristotle's Categories and De Interpretatione (Princeton: Princeton University Press, 1983).
- Ibn al-Salāḥ, 'Uthmān b. 'Abd al-Rahmān al-Shahrazūri, Fatāwā, in Majmū'at al-Rasā'il al-Munīriyya, i (Beirut: Idārat al-Tibā'a al-Munīriyya, 1970).
- Ibn al-Shirshīr, al-Nāshi' al-Akbar. See van Ess, Frühe Mu'tazilitische Hāresiographie.
- Ibn Sīnā (Avicenna), Abū 'Alī, Aqsām al-'Ulūm al-'Aqliyya, in Majmu at al-Rasā'il (Cairo: Matba'at Kurdistān al-'Ilmiyya, 1328/1910).
- De Anima, ed. Fazlur Rahman (London: Oxford University Press, 1959).

- Fī Ithbāt al-Nubuwwāt, ed. Michael Marmura (Beirut: Dār al-Nahār, 1968).
- Kitāb al-Hudūd, ed. and trans. A.-M. Goichon, Livre des définitions (Cairo: Publications de l'Institut français d'archeologie orientale du Caire, 1963).
- al-Ishārāt wal-Tanbīhāt, ed. Sulaymān Dunyā, 4 vols. (Cairo: Dār al-Ma'ārif, 1960). Trans. Shams Constantine Inati, Remarks and Admonitions, i. Logic (Toronto: Pontifical Institute of Mediaeval Studies, 1984).
- al-Najāt fī al-Hikma al-Mantiqiyya wal-Tabī'iyya wal-Ilāhiyya, ed. Mājid Fakhry (Beirut: Dār al-Āfāq al-Jadīda, 1985).
- al-Quwā al-Insāniyya wa-Idrākātuhā, in Majmū'at al-Rasā'il (Cairo: Matba'at Kurdistān al-'Ilmiyya, 1328/1910).
- al-Shifā': al-Ilāhiyyāt, ed. al-Abb Qanawātī and Sa'īd Zayd, 2 vols. (Cairo: al-Hay'a al-'Āmma li-Shu'ūn al-Matābi' al-Amīriyya, 1380/1960).
- al-Shifā': Manṭiq, i. al-Madkhal, ed. al-Abb Qanawātī et al. (Cairo: al-Matba'a al-Amīriyya, 1371/1952).
- Ibn Taymiyya, Taqī al-Dīn Abû al-'Abbās Aḥmad, Aqwam mā Qīl fil-Mashī'a wal-Ḥikma wal-Qadā' wal-Qadar wal-Ta'līl, in Majmū'at al-Rasā'il wal-Masā'il, 5 vols. (Cairo: Matba'at al-Manār, 1349/1930).
- —— Dar' Ta'ārud al-'Aql wal-Naql, ed. Muḥammad Rashid Salīm (Cairo: Dār al-Kutub, 1971).
- al-Furqān, in Majmū'at al-Rasā'il al-Kubrā, 2 vols. (Cairo: al-Maṭba'a al-'Āmira, 1323/1905).
- —— Iqtidā' al-Sirāṭ al-Mustaqīm Mukhālafat Aṣḥāb al-Jaḥīm, trans. Muhammad Umar Memon, Ibn Taymiya's Struggle against Popular Religion (Paris: Mouton & Co., 1976).
- Kitāb Jahd al-Qarīha fī. Tajrīd al-Naṣīḥa, MS. Or. 474 (20), The Library of the University of Leiden.
- Jahd al-Qarīḥa fī. Tajrīd al-Naṣīḥa, abridgement of al-Radd 'alā al-Manṭiqiyyīn by Jalāl al-Dīn al-Suyūṭī, ed. 'Alī Sāmī al-Nashshār (Cairo: Maṭba'at al-Sa'āda, 1947). Also edited by Su'ād 'Abd al-Rāziq and 'Alī Sāmī al-Nashshār (Cairo: Dār al-Naṣr lil-Ṭibā'a, 1970). See also vol. ix of Ibn Taymiyya, Majmu' Fatāwā.
- Majmu' Fatāwā Shaykh al-Islām Aḥmad Ibn Taymiyya, ed. 'Abd Allāh b. Muḥammad b. Qāsim and Muḥammad b. 'Abd Allāh b. Qāsim, 37 vols. (Rabāt: Maktabat al-Ma'ārif, 1961):
- Volume I: Tawhīd al-Ulūhiyya;
- Volume II: Tawhīd al-Rubūbiyya;
- Volume IV: Mufassal al-I'tiqād;
- Volume IX: Jahd al-Qarīḥa fī Tajrīd al-Naṣīḥa; Fī Dabt Kulliyyāt al-Manṭiq wal-Khalal Fīhi.
- Muwāfaqat Ṣaḥīḥ al-Manqūl li-Sarīh al-Ma'qūl, ed. M. M. 'Abd al-Ḥamıd and Muḥammad Hamid al-Faqī, 2 vols. (Cairo: Maṭba'at al-Sunna al-Muḥammadiyya, 1370/1951; repr. Beirut: Dār al-Ma'rifa, n.d.).

- Ibn Taymiyya, Taqī al-Dīn Abū al-'Abbās Aḥmad, *Naqḍ al-Manṭiq*, ed. Muḥammad b. 'Abd al-Razzāq Ḥamza *et al*. (Cairo: Maṭba'at al-Sunna al-Muhammadiyya, 1370/1951).
- al-Radd 'alā al-Mantiqiyyīn, ed. 'Abd al-Samad Sharaf al-Dīn al-Kutubī (Bombay: al-Matba'a al-Qayyima, 1368/1949).
- Risālat Taḥrīm al-Nard wal-Shaṭranj, ed. Muḥammad al-'Abqī and 'Umar al-'Amrāwī (Riyāḍ: Idārat Murāqabat al-Kutub, 1400/1980).
- Tafṣīl al-Ijmāl fīmā Yajib lil-Lāh min Sifāt al-Kamāl, in Majmu at al-Rasā'il wal-Masā'il, 5 vols. (Cairo: Matba'at al-Manār, 1349/1930).
- Ibn Tumlūs, Abū al-Hajjāj Yūsuf b. Muhammad, al-Madkhal li-Sina at al-Mantiq, ed. and trans. Miguel Asin (Madrid: Matba'at Ibiriqa, 1916).
- Ibn al-Wardī, Zayn al-Dīn 'Umar, Tatimmat al-Mukhtaşar fī Akhbār al-Bashar, ed. Aḥmad Badrāwī, 2 vols. (Beirut: Dar al-Ma'rifa, 1970).
- Ijī, 'Isā b. Muḥammad b. 'Abd Allah al-Safawı, Sharḥ al-Ghurra fī al-Mantiq, ed. Albīr Nasrī Nadir (Beirut: Dar al-Mashriq, 1983).
- Ikhwān al-Safā' wa-Khillān al-Wafā', Rasā'il, ed. Khayr al-Dīn al-Ziriklī, 4 vols. (Cairo: al-Matba'a al-'Arabiyya, 1347/1928).
- Jāmī, Nūr al-Dīn 'Abd al-Raḥmān, al-Durra al-Fākhira, ed. N. Heer and Musavi Behbahani (Tehran: Tehran University Press, 1980). Trans. Nicholas Heer, *The Precious Pearl* (Albany: State University of New York, 1979).
- --- 'Al-Jāmi's *Treatise on Existence*', ed. and trans. Nicholas Heer, in *Islamic Philosophical Theology*, ed. Parviz Morewedge (Albany: State University of New York Press, 1979), 237-46, 247-56.
- Jīlānī, 'Abd Allāh, al-Risāla al-Muḥīṭa bi-Tashkīkāt fī al-Qawā'id al-Mantiqiyya ma' Taḥqīqihā, in M. Mohaghegh and T. Izutsu (eds.), Collected Texts and Papers on Logic and Language (Tehran: Tehran University Press, 1974).
- Jurjānī, 'Alī b. Muhammad, *Hāshiya 'alā Tahrīr al-Qawā'id al-Mantiqiyya* (of al-Qutb al-Rāzī), 2nd edn. (Cairo: Mustafa Bābī al-Ḥalabī, 1367/1948).

   *Ta'rīfāt* (Cairo: Mustafa Bābī al-Ḥalabī, 1357/1938).
- Juwaynī, Abū al-Ma'ālī Imām al-Ḥaramayn, al-Burhān fī Uṣūl al-Fiqh, ed. 'Abd al-'Azīm al-Dīb, 2 vols. (Cairo: Dār al-Ansār, 1400/1979).
- al-Kāfiya fī al-Jadal, ed. Fawqiyya Husayn Mahmūd (Cairo: Matba'at 'Isā Bābı al-Halabī, 1979).
- Karmi, Mar'ī Ibn Yūsuf al-Ḥanbalī, al-Kawākib al-Durriyya fī Manāqib al-Imām al-Mujtahid Shaykh al-Islām Ibn Taymiyya, in al-Majmū' al-Mushtamil 'alā al-Durar al-Ātiya, ed. Faraj Allāh al-Kurdī (Cairo: Matba'at Kurdistān al-'Ilmiyya, 1329/1911).
- Kāshif al-Ghitā', 'Alī b. Muhammad, Naqd al-Ārā' al-Mantiqiyya wa-Hall Mushkilātihā (Najaf: Matba'at al-Nu'mān, 1383/1963).
- Kātibī, Najm al-Dīn al-Qazwīnī, al-Risāla al-Shamsiyya fī al-Qawā'id al-Mantiqiyya, ed. and trans. A. Springer, The Logic of the Arabians (Calcutta: F. Carberry, Bengal Military Orphan Press, 1854).
- Khabisi, 'Ubayd Allah b. Fadl, Sharh 'ala Matn Tahdhīb al-Mantiq (of al-

- Sa'd al-Taftāzānī), 3rd edn. (Qum: Maktabat al-Wajdānī, 1965).
- Khuwārizmī, Muḥammad b. Aḥmad b. Yūsuf Abū 'Abd Allāh, Mafātīḥ al-'Ulūm, ed. G. van Vloten (Leiden: E. J. Brill, 1968).
- Khuwārizmī, Muḥammad b. Mūsā, Kitāb al-Jabr wal-Muqābala, ed. and trans. Fr. Rosen, The Algebra of Mohammed Ben Musa (London: J. L. Cox, 1831).
- Kutubi, Muḥammad b. Shākir b. Aḥmad, Fawāt al-Wafayāt, 2 vols. (Cairo: Būlāq, AH 1283).
- Lawkarī, Abū 'Abbās Faḍl b. Muḥammad, Bayān al-Ḥaqq bi-Damān al-Sidq: Manṭiq, i. Madkhal, ed. Ibrahīm Dībājī (Tehran: Mu'assasat Intishārāt Amīr Kabır, 1986).
- Maimonides (Ibn Maymūn), Maqāla fī Sina at al-Mantiq, ed. Mubahat Tūrker, Ankara Üniversitesi Dil ve Tarih-Cografya Fakültesi Dergisi, 18 (1960), 40-64.
- Maqdisi, Abū Zayd Aḥmad b. Sahl al-Balkhī, Kitāb al-Bad' wal-Ta'rīkh, ed. C. Huart, 6 vols. (Paris: Arnast Larū, 1899; repr. Baghdad: Maktabat al-Muthannā, n.d.).
- Mūsilī, 'Abd Allāh Ibn Mawdūd, al-Ikhtiyār li-Ta'līl al-Mukhtār, 5 vols. (Cairo: Mustafa Bābi al-Halabi, 1370/1951).
- Muslim, Abū al-Hasan b. al-Hajjāj al-Qushayrī, Sahīh, ed. Muhammad Fu'ād 'Abd al-Bāqī, 5 vols. (Cairo: 'Īsā Bābī al-Halabī, 1374-5/1955-6).
- Najāshī, Abū al-'Abbās Aḥmad, *Rijāl*, ed. Sayyid Mūsā al-Shubayrī (Qum: Mu'assasat al-Nashr al-Islāmiyya, 1986).
- Nawbakhtı, Abū Muḥammad b. Mūsā, Firaq al-Shī'a, ed. H. Ritter (Istanbul and Leipzig: Maṭba'at al-Dawla, 1931).
- Qā'īnī, 'Alī Fadīl al-Najafī, Mu'jam Mu'allifī al-Shī'a (Tehran: Wizārat al-Irshād al-Islāmī, 1985).
- Qarāfī, Shihāb al-Dīn Aḥmad Ibn Idrīs, Sharḥ Tanqīḥ al-Fuṣūl fī Ikhtiṣār al-Maḥṣūl fī al-Uṣūl, ed. Ṭaha 'Abd al-Ra'ūf Sa'd (Cairo and Beirut: Maktabat al-Kulliyyāt al-Azharîyya, 1973).
- Qiftī, Jamāl al-Dīn Abū al-Ḥasan 'Alī b. Yūsuf, *Tārīkh al-Ḥukamā*', ed. J. Lippert (Leipzig: Dieterīch'sche Verlagsbuchhandlung, 1903).
- Al-Qur'ān al-Karīm (Kuwait: Wizārat al-Awqāf wal-Shu'ūn al-Islāmiyya, 1402/1981). Trans. [1] Arthur J. Arberry, The Koran Interpreted, 2 vols. (London and New York: George Allen & Unwin Ltd., 1955); [2] Mohammed Marmaduke Pickthall, The Meanings of the Glorious Koran (New York: Mentor, n.d.).
- Rāzī, Fakhr al-Dīn Muḥammad b. 'Amr, Lubāb al-Ishārāt, 2nd edn. (Cairo: Maktabat al-Khānjī, 1355/1936).
- Ma'ālim Usul al-Dīn (Cairo: al-Matba'a al-Husayniyya, 1905).
- al-Mabāḥith al-Mashriqiyya fī 'Ilm al-Ilāhiyyāt wal-Tabī'iyyāt, 2 vols. (Haydarabad: Dā'irat al-Ma'ārif al-'Uthmāniyya, 1343/1924).
- Muhassal Afkār al-Mutaqaddimīn wal-Muta'akhkhirīn min al-'Ulamā' wal-Hukamā' wal-Mutakallimīn (Cairo: al-Matba'a al-Husayniyya, 1905).

- Rāzī, Khadr b. Muḥammad b. 'Alī, Sharh al-Ghurra fī al-Manţiq, ed. Albīr Nasri Nadir (Beirut: Dar al-Mashriq, 1983).
- Rāzī, Qutb al-Dīn Mahmūd b. Muḥammad, *Tahrīr al-Qawā'id al-Mantiqiyya* fī Sharḥ al-Risāla al-Shamsiyya (of Kātibī), 2nd edn. (Cairo: Mustafa Bābī al-Halabī, 1367/1948).
- Sextus Empiricus, Against the Logicians, trans. R. G. Bury, ii (London and Cambridge, Mass.: Harvard University Press, 1933).
- Shahrastānī, 'Abd al-Karīm, Kitāb Nihāyat al-Iqdām fī 'Ilm al-Kalām, ed. A. Guillaume (repr. Baghdad: Maktabat al-Muthannā, 1963).
- Kitāb al-Milal wal-Nihal, ed. William Cureton (Leipzig: Otto Harrassowitz, 1923).
- Shawkānı, Muhammad b. 'Alī b. Muhammad, al-Badr al-Tāli' bi-Mahāsin man ba'd al-Qarn al-Sābi', 2 vols. (Cairo: Maṭba'at al-Sa'āda, 1348/1929).
- ---- Irshād al-Fuhūl ilā Taḥqīq al-Ḥaqq min 'Ilm al-Usūl (Surabaya: Maktabat Aḥmad b. Sa'd b. Nabhān, n.d.).
- Shīrāzī, Abū Ishāq Ibrahīm b. 'Alı, Kitāb al-Luma' fī Uṣūl al-Fiqh, ed. Muḥammad Badr al-Dīn al-Na'sānī (Cairo: Matba'at al-Sa'āda, 1326/1908).
- Subkī, Tāj al-Dīn 'Abd al-Wahhāb Ibn Taqī al-Dīn, *Tabaqāt al-Shāfi'iyya al-Kubrā*, 6 vols. (repr. Beirut: Dār al-Ma'rifa, n.d.).
- Suhrawardī, Shihāb al-Dīn Yaḥyā, Hikmat al-Ishrāq, ed. Henry Corbin, Œuvres philosophiques et mystiques (Tehran and Paris: Bibliotheque iranienne, 1977).
- Mantiq al-Talwihāt (Tehran: Matba'at Jāmi'at Tahrān, 1955).
- Suyūtī, Jalāl al-Dīn, Şawn al-Mantiq wal-Kalām 'an Fann al-Mantiq wal-Kalām, ed. 'Alī Sāmı al-Nashshār (Cairo: Matba'at al-Sa'āda, 1947). Also edited as Şawn al-Mantiq wal-Kalām 'an Fannay al-Mantiq wal-Kalām by Su'ād 'Abd al-Rāziq and 'Alī Sāmī al-Nashshār (Cairo: Dār al-Naṣr lil-Tibā'a, 1970).
- Taftāzānī, Mas'ūd b. 'Umar, Sharh al-'Aqā'id al-Nasafiyya, ed. Claude Salāma (Damascus: Manshūrāt Wizārat al-Thaqāfa wal-Irshād al-Qawmī, 1974).
- Tahānawī, Muhammad b. 'Alī b. Muhammad Hāmid, Kashshāf Istilāhāt al-Funūn, ed. A. Sprenger, 2 vols. (Calcutta: W. N. Lees' Press, 1862).
- Tawhīdī, Abū Hayyān, Kitāb al-Imtā' wal-Mu'ānasa, ed. Ahmad Amīn and Ahmad al-Zayn (Beirut: Dār Maktabat al-Hayāt, n.d.).
- Tihrānī, Āghā Buzurg, al-Dharī'a ilā Taṣānīf al-Shī'a, 26 vols. (Beirut: Dār al-Adwā', 1983).
- Tirmidhī, Abū 'Isā, Sahīh, 2 vols. (Cairo: al-Matba'a al-'Āmira, 1292/1875). Tūfī, Najm al-Dīn, 'Alam al-Jadhal fī 'Ilm al-Jadal, ed. Wolfhart Heinrichs (Wiesbaden: Franz Steiner, 1987).
- Tūsī, Nasīr al-Dīn, Sharh al-Ishārāt, ed. Sulaymān Dunyā, 3 vols. (Cairo: Dār al-Ma'ārif, 1960).
- --- Talkhīs al-Muhassal (Cairo: Matba'at al-Husayniyya, 1905).
- Yahyā b. 'Adī, Ibn Ḥamīd Ibn Zakariyyā, Fī Tabyīn al-Faṣl bayna Ṣinā'atay al-Manṭiq al-Falsafī wal-Nahw al-Arabī, ed. G. Endress, 'The Debate

between Arabic Grammar and Greek Logic in Classical Islamic Thought', Journal of the History of Arabic Science, 1 (1977), 320-2, 106-18 [339-51]; and 2 (1978), 38-50 [181-93].

Yāqūt, Shihāb al-Din Abū 'Abd Allāh al-Ḥamawī, Mu'jam al-Buldān, 5 vols. (Beirut: Dar Bayrūt, 1374-6/1955-7).

Ziriklī, Khayr al-Dīn, al-A'lām, 8 vols. (Beirut: Dar al-'Ilm lil-Malāyīn, 1980).

#### II. Secondary Sources

Aaron, Richard I., *The Theory of Universals*, 2nd edn. (Oxford: Clarendon Press, 1967).

'Abd al-Rāziq, Mustafa, Faylasūf al-Arab wal-Mu'allim al-Thānī (Cairo: 'Īsā Bābī al-Halabī, 1364/1945).

Abū Rayyān, Muhammad, *Usul al-Falsafa al-Ishrāqiyya* (Cairo: Maktabat al-Anjlū-Misriyya, 1959).

Abū Zahra, Muḥammad, *Ibn Taymiyya*, 2nd edn. (Cairo: Dar al-Fikr al-'Arabi, 1958).

Affifi, A. E., 'Ibn 'Arabi', in M. M. Sharif (ed.), A History of Muslim Philosophy (Karachi: Royal Book Co., 1966), 398-420.

— The Mystical Philosophy of Muhyid Dîn Ibnul Arabī (Lahore: Ashraf Press, 1964).

Ambouba (Anbūba), Adel, *Ihya al-Jabr: Dars li-Kitāb al-Khuwārizmī fī al-Jabr wal-Muqābala* (Beirut: Publications de l'Universite libanaise, 1968).

Anawati, G. C., 'Philosophy, Theology, and Mysticism', in J. Schacht and C. E. Bosworth (eds.), *The Legacy of Islam*, 2nd edn. (Oxford: Clarendon Press, 1974), 350-91.

Badawī, 'Abdurrahman, Les Œuvres d'al-Ghazālī (Kuwait: Wakālat al-Matbū'āt, 1977).

Black, Deborah L., Logic and Aristotle's Rhetoric and Poetics in Medieval Arabic Philosophy (Leiden: E. J. Brill, 1990).

Bochenski, I. M., Ancient Formal Logic (Amsterdam: North-Holland Publishing Co., 1951).

Brennan, Joseph Gerard, A Handbook of Logic (New York: Harper & Row, 1961).

Brockelmann, Carl, Geschichte der arabischen Literatur, 2 vols. (Leiden: E. J. Brill, 1943-9); 3 supplements (Leiden: E. J. Brill, 1937-42).

Brunschvig, R., 'Ğāmi' Māni'', in Abdel Mağid Turki (ed.), Études d'islamologie, 2 vols. (Paris: G.-P. Maisonneuve et Larose, 1976), i. 355-7.

"Pour ou contre la logique grecque chez les theologiens-juristes de l'Islam: Ibn Hazm, al-Ghazālī, Ibn Taymiyya', in Abdel Magid Turki (ed.), Études d'islamologie, 2 vols. (Paris: G.-P. Maisonneuve et Larose, 1976), i. 303-27.

Burrell, David B., 'Essence and Existence: Avicenna and Greek Philosophy',

- Melanges de l'Institut dominicain d'etudes orientales du Caire, 17 (1986), 53-66.
- Butterfield, Herbert, *The Origins of Modern Science*, rev. edn. (New York: The Free Press, 1965).
- Butterworth, Charles, Averroes' Middle Commentaries on Aristotle's Categories and De Interpretatione (Princeton, NJ: Princeton University Press, 1983).
- Chisholm, R. M., 'Sextus Empiricus and Modern Empiricism', *Philosophy of Science*, 8/1 (1941), 371-84.
- Cohen, Morris, A Preface to Logic (Cleveland: Meridian Books, n.d.).
- Copi, I. M., 'Essence and Accident', in J. M. E. Moravcsik (ed.), Aristotle: A Collection of Critical Essays (London: Macmillan, 1968), 149-66.
- Copleston, Frederick, A History of Philosophy, vol. 1, pt. 1 (New York: Image Books, 1962).
- Davidson, Herbert A., 'Alfarabi and Avicenna on the Active Intellect', *Viator*, 3 (1972), 109-78.
- —— Proofs for Eternity, Creation, and the Existence of God in Medieval Islamic and Jewish Philosophy (New York and Oxford: Oxford University Press, 1987).
- Dozy, P., Supplement aux dictionnaires arabes, 2 vols, 2nd edn. (Leiden: E. J. Brill, 1927).
- Dummett, Michael, 'The Justification of Deduction', in M. Dummett, *Truth and Other Enigmas* (London: The Trinity Press, 1978), 290-318.
- Elamrani-Jamal, A., Logique aristotelicienne et grammaire arabe: Étude et documents (Paris: Librairie philosophique J. Vrin, 1983).
- Encyclopaedia Iranica (London: Routledge & Kegan Paul, 1982- ).
- Encyclopaedia of Islam (Leiden: E. J. Brill, 1913-36).
- Encyclopaedia of Islam, New (2nd) Edition (Leiden: E. J. Brill, 1960-).
- Encyclopedia of Philosophy, 8 vols. (New York: Macmillan Publishing Co., 1967).
- Endress, G. See Yahyā b. 'Adī.
- Fakhry, Majid, A History of Islamic Philosophy (New York and London: Columbia University Press, 1970).
- Farhān, M. J., 'al-Baḥth al-Mantiqı ladā al-Suhrawardı: Dirāsa Tahlīliyya li-Mantiq al-Lamahāt', al-Bāḥith, 45-6 (1987), 73-100.
- Ghurāb, Mahmūd, al-Fiqh 'inda al-Shaykh al-Akbar Muhyī al-Dīn Ibn al-Arabī (Damascus: Maṭba'at Zayd b. Thābit, 1401/1981).
- Gohlman, William E., The Life of Ibn Sīnā (Albany: State University of New York Press, 1974).
- Goldziher, Ignaz, 'The Attitude of Orthodox Islam Toward the "Ancient Sciences"', in Merlin L. Swartz (trans. and ed.), *Studies on Islam* (New York and Oxford: Oxford University Press, 1981), 185-215.
- Groarke, L., Greek Scepticism: Anti-Realist Trends in Ancient Thought (Montreal and Kingston: McGill-Queen's Press, 1990).

- Gutas, Dimitri, Avicenna and the Aristotelian Tradition (Leiden: E. J. Brill, 1988).
- Hallaq, Wael B., 'Ibn Taymiyya on the Existence of God', Acta Orientalia (Copenhagen), 52 (1991), 49-69.
- —— 'Non-Analogical Arguments in Sunnī Juridical *Qiyās*', *Arabica*, 36 (1989), 286–306.
- ---- 'Notes on the Term qarīna in Islamic Legal Discourse', Journal of the American Oriental Society, 108 (1988), 475-80.
- 'On Inductive Corroboration, Probability and Certainty in Sunnī Legal Thought', in Nicholas Heer (ed.), *Islamic Law and Jurisprudence: Studies in Honor of Farhat J. Ziadeh* (Seattle: University of Washington Press, 1990), 3-31.
- ---- 'Was the Gate of Ijtihad Closed?', International Journal of Middle East Studies, 16/1 (1984), 3-41.
- Haque, Serajul, 'Ibn Taymiyya', in M. M. Sharif (ed.), A History of Muslim Philosophy (Karachi: Royal Book Co., 1966), 796-819.
- Heer, Nicholas, 'Ibn Taymiyah's Empiricism', in Farhad Kazemi and R. D. McChesney (eds.), A Way Prepared: Essays on Islamic Culture in Honor of Richard Bayly Winder (New York and London: New York University Press, 1988), 109-15.
- —— 'Al-Jāmī's Treatise on Existence', in Parviz Morewedge (ed.), Islamic Philosophical Theology (Albany: State University of New York Press, 1979), 223-56.
- Houben, J., 'Avicenna and Mysticism', Avicenna Commemoration Volume (Calcutta: Baptist Mission Press, 1956), 205-21.
- Izutsu, Toshihiko, 'The Problem of Quiddity and Natural Universal in Islamic Metaphysics', in Études philosophiques presentees au Ibrahim Madkour (Cairo: GEBO, 1974), 131-77.
- Jabre, F., Essai sur le lexique de Ghazălī (Beirut: Publications de l'Universite libanaise, 1985).
- Jadaane, F., L'Influence du sto\u00e4cisme sur la pensee musulmane (Beirut: Dar al-Machreq, 1968).
- Joseph, H. W. B., Introduction to Logic (Oxford: Oxford University Press, 1916).
- Kaufmann, Walter, Critique of Religion and Philosophy (Princeton, NJ: Princeton University Press, 1958).
- Kneale, William and Martha, *The Development of Logic* (Oxford: Clarendon Press, 1984).
- Kogan, Barry S., Averroes and the Metaphysics of Causation (Albany: State University of New York Press, 1985).
- Landolt, Hermann, 'Suhrawardī's "Tales of Initiation", Journal of the American Oriental Society, 107 (1987), 475-86.
- Langer, William L. (ed.), An Encyclopedia of World History (Cambridge: Riverside Press, 1952).

- Laoust, Henri, 'La Biographie d'ibn Taimīya d'apres Ibn Katīr', Bulletin d'etudes orientales, 9 (1942-3), 115-62.
- Contribution à une etude de la methodologie canonique de Taķī-D-Dīn Ahmad B. Taimīya (Cairo: Imprimerie de l'Institut français d'archeologie orientale, 1939).
- Essai sur les doctrines sociales et politiques de Taķī-D-Dīn Aḥmad B. Taymiya (Cairo: Imprimerie de l'Institut français d'archéologie orientale, 1939).
- 'L'Influence d'Ibn-Taymiyya', in Alford T. Welch and Pierre Cachia (eds.), *Islam: Past Influence and Present Challenge* (Edinburgh: Edinburgh University Press, 1979), 15-33.
- --- 'Le Reformisme d'Ibn Taymiya', Islamic Studies, 1/3 (1962), 27-47.
- --- Les Schismes dans l'Islam (Paris: Payot, 1965).
- Lear, Jonathan, Aristotle and Logical Theory (Cambridge: Cambridge University Press, 1980).
- Lerner, Ralph, and Mahdi, Muhsin (eds.), Medieval Political Philosophy (Ithaca: Cornell University Press, 1963).
- Little, Donald P., 'Did Ibn Taymiyya Have a Screw Loose?', Studia Islamica, 41 (1975), 93-111.
- ---- 'The Historical and Historiographical Significance of the Detention of Ibn Taymiyya', *International Journal of Middle East Studies*, 4 (1973), 311-27.
- Mach, Rudolph, Catalogue of Arabic Manuscripts (Yahuda Section) in the Garrett Collection (Princeton, NJ: Princeton University Press, 1977).
- Mahdi, Muhsin, 'Language and Logic in Classical Islam', in G. E. von Grunebaum (ed.), Logic in Classical Islamic Culture (Wiesbaden: Otto Harrassowitz, 1970) 51-83.
- Makdisi, George, 'The Hanbali School and Sufism', Boletín de la Asociación Espanola de Orientalistas, 15 (1979), 115-26.
- Margoliouth, D. S., 'The Discussion between Abu Bishr Mattā and Abū Sa'īd al-Sīrāfī on the Merits of Logic and Grammar', *Journal of the Royal Asiatic Society* (1905), 79-129.
- Marmura, Michael E., 'Avicenna's Chapter on Universals in the *Isagoge* of his *Shifā*'', in Alford T. Welch and Pierre Cachia (eds.), *Islam: Past Influence and Present Challenge* (Edinburgh: Edinburgh University Press, 1979), 34-56.
- 'Ghazālī and Demonstrative Science', Journal of the History of Philosophy, 3 (1965), 183-204.
- 'Some Aspects of Avicenna's Theory of God's Knowledge of Particulars', Journal of the American Oriental Society, 82 (1962), 299-312.
- Maroth, Miklós, Ibn Sīnā und die peripatetische 'Aussagenlogik' (Leiden: E. J. Brill, 1989).
- Mates, Benson, Stoic Logic (Berkeley: University of California Press, 1961).

- Memon, Muhammad Umar, Ibn Taymiya's Struggle against Popular Religion (with an annotated translation of his Kitāb iqtidā' al-sirāt al-mustaqīm mukhālafat ashāb al-jahīm) (Paris: Mouton & Co., 1976).
- Michel, Thomas, 'Ibn Taymiyya's Critique of Falsafa', Hamdard Islamicus, 6 (1983), 3-14.
- Mohaghegh, M., and Izutsu, T. (eds.), Collected Texts and Papers on Logic and Language (Tehran: Tehran University Press, 1974).
- Morewedge, Parviz, 'The Logic of Emanationism and Sūfism in the Philosophy of Ibn Sīnā (Avicenna)', Journal of the American Oriental Society, 91/4 (1971), 467-76; and 92/1 (1972), 1-18.
- Morris, James W., 'Ibn 'Arabī's "Esotericism": The Problem of Spiritual Authority', Studia Islamica, 71 (1990), 37-64.
- Nashshār, 'Alī Sāmī, Manāhij al-Bahth 'Inda Mufakkirī al-Islām, 4th edn. (Cairo: Dar al-Ma'ārif, 1978).
- Nasr, Seyyed Hossein, An Introduction to Islamic Cosmological Doctrines (Boulder: Shambhala Publications, 1978).
- Perlmann, Moshe, 'Ibn Hazm on the Equivalence of Proofs', The Jewish Quarterly Review, NS 40 (1949/50), 279-90.
- Pines, S., 'The Semantic Distinction between the Terms Astronomy and Astrology According to Al-Bīrūnī', Isis, 55 (1964), 343-9.
- 'Note on Abu'l Barakāt's Celestial Physics', in Collected Works of Shlomo Pines, i. Studies in Abu'l-Barakāt al-Baghdādī's Physics and Metaphysics (Leiden and Jerusalem: The Magnes Press, 1979), 175-80.
- 'Studies in Abu'l-Barakāt al-Baghdādi's Poetics and Metaphysics', in Collected Works of Shlomo Pines, i. Studies in Abu'l-Barakāt al-Baghdādī's Physics and Metaphysics (Leiden and Jerusalem: The Magnes Press, 1979), 259-338.
- Qadir, C. A., 'An Early Islamic Critic of Aristotelian Logic: Ibn Taymiyyah', International Philosophical Quarterly, 8 (1968), 498-512.
- Quinton, Anthony, Francis Bacon (Oxford: Oxford University Press, 1980).
- Rahman, F., 'Essence and Existence in Avicenna', in Richard Hunt et al., Mediaeval and Renaissance Studies, 4 (London: Warburg Institute, 1958),
- Prophecy in Islam (London: George Allen & Unwin Ltd., 1958).
- Rescher, Nicholas, *The Development of Arabic Logic* (Pittsburgh: University of Pittsburgh Press, 1964).
- --- 'The Impact of Arabic Philosophy on the West', in N. Rescher, Studies in Arabic Philosophy (Hertford: University of Pittsburgh Press, 1966), 147-57.
- Robinson, Richard, Definition (Oxford: Clarendon Press, 1950).
- Russell, Bertrand, A History of Western Philosophy (London: Unwin Paperbacks, 1979).

- Sabra, A. I., 'Avicenna on the Subject Matter of Logic', *Journal of Philosophy*, 77/11 (1980), 746-64.
- Schacht, Joseph, An Introduction to Islamic Law (Oxford: Clarendon Press, 1964).
- Sezgin, Fuat, Geschichte des arabischen Schrifttums (Leiden: E. J. Brill, 1967- ).
- Sheikh, M. Saeed, A Dictionary of Muslim Philosophy (Lahore: Zarreen Art Press, 1970).
- Shorter Encyclopaedia of Islam (Leiden: E. J. Brill, 1974).
- Souissi, Mohammed, La Langue des mathematiques en Arabe (Tunis: Imprimerie officielle, 1968).
- Stough, Charlotte L., Greek Skepticism: A Study in Epistemology (Berkeley and Los Angeles: University of California Press, 1969).
- Taylor, Richard, Metaphysics, 2nd edn. (New Jersey: Prentice-Hall, 1974).
- van Ess, Josef, Frühe Mu'tazilitische Häresiographie (Beirut and Wiesbaden: Franz Steiner Verlag, 1971).
- 'The Logical Structure of Islamic Theology', in G. E. von Grunebaum (ed.), Logic in Classical Islamic Culture (Wiesbaden: Otto Harrassowitz, 1970), 21-50.
- "Skepticism in Islamic Religious Thought", Al-Abhāth, 21/1 (1968), 1-18. Voorhoeve, P., Handlist of Arabic Manuscripts in the Library of the University of Leiden and Other Collections in the Netherlands, 2nd edn. (The Hague: Leiden University Press, 1980).
- Watt, W. Montgomery, *The Formative Period of Islamic Thought* (Edinburgh: Edinburgh University Press, 1973).
- Weiss, Bernard, 'Knowledge of the Past: The Theory of *Tawātur* According to Ghazālī', *Studia Islamica*, 61 (1985), 81-105.
- Wensinck, Arent Jan, Concordance et indices de la Tradition Musulmane, 8 vols. (Leiden: E. J. Brill, 1936-88).
- Wolfson, Harry, *The Philosophy of the Kalam* (Cambridge, Mass.: Harvard University Press, 1976).
- —— 'The Terms *Taşawwur* and *Taşdīq* in Arabic Philosophy and their Greek, Latin and Hebrew Equivalents', *Moslem World*, 33 (1943), 114-28.
- Zeller, E., Stoics, Epicureans and Sceptics, trans. J. Reichel (New York: Russell & Russell, 1962).
- Ziai, Hossein, Knowledge and Illumination: A Study of Suhrawardī's Ḥikmat al-Ishrāq (Atlanta: Scholars Press, 1990).
- Zimmermann, F. W., Al-Fārābī's Commentary and Short Treatise on Aristotle's De Interpretatione (London: Oxford University Press, 1981).

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